Program Review

Core Curriculum

Marshall University

October 2016



MARSHALL UNIVERSITY

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Marshall University Program Review

Program: Core Curriculum	
Date of Last Review: This is the program's first review	

I. History of the Development of Marshall's Core Curriculum and Its Consistency with Marshall University's Mission

The purpose of Marshall University's mission statement, approved in 2004, is to guide all operations of the institution. Marshall's mission statement is as follows:

Marshall University is a multi-campus public university providing **innovative** undergraduate and graduate education that contributes to the **development** of **society** and the **individual**. The University actively facilitates learning through the preservation, discovery, synthesis, and dissemination of knowledge.

This mission statement is followed by a series of goals for the institution, the faculty, staff, students, and administration. The goals that align most closely with the University's Core Curriculum are that Marshall University will provide affordable, high quality undergraduate and graduate education appropriate for the state and region; provide services and resources to promote student learning, retention, and academic success; and educate a citizenry capable of living and working effectively in a **global environment**. Marshall University faculty will **improve instruction** through the use of **innovative teaching methods** that require students to become actively involved in the learning process and develop the critical thinking skills necessary for life-long learning; actively engage and mentor students in scholarly, artistic, and creative endeavors; help students develop the ability to navigate through a rapidly changing society; regularly review the curriculum, degrees, and programs offered, and recommend necessary additions and deletions to meet changing needs of the state and region. Marshall University students will have the opportunity to use their knowledge, creativity, and critical thinking skills to make their communities better places in which to live: examine critically the many issues facing society and, through the process of civil discourse, prepare themselves to become socially responsible individuals who contribute to the betterment of society; appreciate and cultivate diversity, and value differences.

All of Marshall University's Degree Programs, including those at the doctoral and professional levels, have articulated (and assessed student achievement of) student learning goals (hereafter referred to as outcomes) at least since the 1990s. Moreover, degree programs have always shown how their student learning outcomes supported the educational mission of Marshall University. However, prior to 2008, Marshall did not specify overarching university learning outcomes. Rather,

it articulated broad-based general education requirements for the Marshall Baccalaureate Degree through the Marshall Plan. Students fulfilled the requirements of the Marshall Plan by completing courses from an approved list.

In 2006, Marshall's President, Dr. Stephen Kopp, challenged the faculty to consider moving from a menu-driven general education curriculum that lacked clear connections between required general education (Marshall Plan) courses and those students completed in their majors. Based on research from Spies (2000) and Richard Paul and colleagues from the Center for Critical Thinking, he argued that the Marshall curriculum should enable students to become effective critical thinkers, i.e. to analyze issues and problems by carefully evaluating evidence, weighing competing viewpoints, being mindful of their own assumptions and, through a process of weighing these issues plus their potential consequences, offer reasoned recommendations/solutions (Refer to #Appendix 1 for selected slides from President Kopp's 2006 presentation). He further challenged the faculty to consider the logical connections among disciplines and domains of thinking. He argued that the ability to solve problems necessitates the careful integration and evaluation of information from various core domains of thinking.

During academic year 2004-2005, Marshall also began to administer the *Collegiate* Learning Assessment (CLA), a nationally benchmarked direct assessment of student learning developed by the Council for Aid to Education. The CLA directly measured students' abilities to think critically (i.e. to reason analytically and to solve problems) and to write effectively. Although results for academic years 2005-2006 and 2006-2007 had shown Marshall's value-added (difference between incoming freshman and graduating senior performance adjusted for incoming academic ability) to be at the expected level, the report the university received in the summer of 2007 indicated that Marshall's decile rankings for those years were 5th and 4th. respectively. In other words, Marshall's value-added scores were better than only 40% (2005-06) and 30% (2006-07) of those of other participating higher education institutions (Refer to #Appendix II for Marshall's CLA Report for Academic year 2006-2007). Marshall initiated administration of the National Survey of Student Engagement (NSSE), an indirect measure of student learning and engagement, in the spring of 2008. Findings from that administration showed that Marshall's students (freshmen and seniors) scored significantly lower than did students from our Carnegie Peer institutions in the area of Active and Collaborative Learning (Please refer to #Appendix III for the 2008 NSSE Benchmark Comparison Report). Taken together, the early results from the CLA and NSSE provided evidence that the university needed to develop a more intentional focus on infusing critical thinking pedagogy through active learning throughout (and earlier in) the curriculum.

Committees, consisting of faculty from all academic colleges within the university, carefully studied and considered the evidence presented and proposed a recommendation (SR-07-08-[36] 67) that the University adopt seven Core Domains of Critical Thinking (Scientific, Ethical/Social/Historical, Abstract/Mathematical, Multicultural/International, Aesthetic/Artistic Thinking, Information/Technical Literacy,

and Written/Oral/Visual Communication). Marshall University's Faculty Senate approved this recommendation in 2008.

Fueled with information from the 2006-2007 *CLA* results and the 2008 *NSSE* report, the passage of SR-07-08-[36] 67 laid the foundation for the work of the second Core Foundations Ad-Hoc Committee, which developed Marshall's Core Curriculum, approved as SR-08-09-36R in 2009 (Please refer to #Appendix_IV).

The newly approved Core Curriculum included an interdisciplinary First-Year Seminar (FYS) and a minimum of two courses at the 100- or 200-levels approved by the University's General Education Council as critical thinking (CT) courses. In academic year 2010-2011 these courses were introduced and an electronic repository (General Education Assessment Repository: GEAR), allowing the collection of student work for assessment, was developed. Then, in the spring and summer of 2011 two developments occurred, each of which played major roles in the further refinement of overarching learning outcomes at Marshall. The first was an invitation from the Higher Learning Commission (HLC) asking Marshall to join Open Pathways Cohort 3, whose Quality Initiative would be to test the Lumina Foundation's Degree Qualifications Profile (DQP) (Refer to #Appendix V for Marshall's Invitation from the HLC). The second was the initial assessment of authentic student work products (artifacts) from FYS that had been uploaded into GEAR. Among other things, faculty who assessed these artifacts recommended further development of assessment rubrics for Marshall's domains of thinking.

During academic year 2011-2012 three projects (all part of Marshall's Quality Initiative) ran simultaneously. In the first project, the majority of associate, baccalaureate, and master's degree programs at Marshall University tested the DQP. The second project used the principles of the Quality Initiative to respond to the recommendations of the faculty workgroup that had completed the first assessment of the FYS artifacts uploaded into GEAR. Led by a three-person steering committee consisting of the Chair of the University's General Education Council, the Executive Director of the Center for Teaching and Learning, and the Director of Academic Assessment, 21 faculty, consisting of representatives from each academic college in the university, used the DQP and AAC&U Value rubrics to examine the university's domains of thinking and the rubrics it had used for GEAR artifact assessment. Their work, which was vetted through key university committees, e.g. the University Assessment Committee, the General Education Council, and members of the Faculty Senate, resulted in a proposed Marshall University Baccalaureate Degree Profile. This degree profile updated the Core Domains of Critical Thinking and developed each into outcome statements that would be expected of recipients of bachelors' degrees. The following chart shows the relationship between DQP Domains, 2008 Marshall Domains, and revised domains and learning outcomes approved by the Faculty Senate on January 31, 2013, with the rationale for each change. These outcomes indicate what all Marshall Baccalaureate graduates are expected to know and be able to do upon receiving a bachelor's degree, regardless of academic major. (Please refer to #Appendix VI for

a copy of SR-12-13-17-Baccalaureate Degree Profile Approval-Faculty Senate-2012-13).

DQP Domain	2008 MU Domain	2013 MU Domain	2013 MU Outcome	Rationale for Change
Communication Fluency	Oral/Written/Visual Communication	Communication Fluency	Students will develop cohesive oral, written, and visual communications tailored to specific audiences.	Marshall's idea of this domain has not changed – it still should include the three aspects of communication. Since the outcome will make this explicit, we argue that the term "communication" in the domain is sufficient to encompass all aspects of communication.
None	Aesthetic/Artistic Thinking	Creative Thinking	Students will outline multiple divergent solutions to a problem, develop and explore risky or controversial ideas, and synthesize ideas/expertise to generate innovations.	This area of learning is not part of DQP, but is an important part of Marshall's Core Domains. As currently written, though, the domain is too discipline-specific. We argue that the proposed name, "creative thinking" expands this domain to include all disciplines across campus.
Civic Learning	Ethical/Social/ Historical Thinking	Ethical and Civic Thinking	Students will determine the origins of core beliefs and ethical principles, evaluate the ethical basis of professional rules and standards of conduct, evaluate how academic theories and public policy inform one another to support civic well-being, and analyze complex ethical problems to address competing interests.	While civic learning is part of the DQP, ethics is not – and consensus from the MU community during the testing of the DQP was that it's important to explicitly include ethics across all degree programs. We argue that the DQP language of civic learning is still useful because it is broader, but inclusive of, social and historical thinking. Finally, in testing the DQP, we found that a significant number of programs did not align to Civic Learning. Therefore, we have written our outcome to be broader than that of the DQP.
Use of Information Resources	Information/ Technical Literacy	Information Literacy	Students will revise their search strategies and employ appropriate research tools, integrate relevant information from reliable sources, question and evaluate the complexity of the information environment, and use information in an ethical manner.	Consensus from the MU community during the testing of the DQP was that "use of information resources" is an important learning domain. We propose to change MU's current name from "information/technical literacy" to "information literacy" because the latter suggests the level of analysis and evaluation in which students should engage to critically examine information sources.
Broad, Integrative Learning	None	Integrative Thinking	Students will make connections and transfer skills and learning among varied disciplines, domains of thinking, experiences, and situations.	Although this is an element we propose be added to Marshall's Domains, we argue that it was implicitly included before, in both FYS and CT course designs. The addition of this domain simply makes its inclusion explicit.
Engaging Diverse Perspectives	Multicultural/ International Thinking	Intercultural Thinking	Students will evaluate generalizations about cultural groups, analyze how cultural beliefs might affect communication across cultures, evaluate how specific approaches to	Marshall faculty have expressed a commitment to multicultural and international learning at least since the inception of the "Marshall Plan" in the early 1990s. It continues to be a priority, e.g. the INTO project. However, we noted that a large number of Marshall's Degree

			global issues will affect multiple cultural communities or political institutions, and untangle competing economic, religious, social, political, or geographical interests of cultural groups in conflict.	Programs did not align to this DQP area of learning. Therefore, we have defined the Marshall Domain's outcome much more broadly than was the "Engaging Diverse Perspectives" outcome in the DQP.
Analytic Inquiry	Scientific Thinking	Inquiry-Based Thinking	Students will formulate focused questions and hypotheses, evaluate existing knowledge, collect and analyze data, and draw justifiable conclusions.	In the testing of the DQP, there was consensus from MU's programs that analytic inquiry, which we argue broadly corresponded to MU's "scientific thinking" domain, is an important domain of thinking. Our current proposal modifies the DQP language because "analytic" suggests only one element of inquiry. Likewise, MU's current domain name, "scientific," suggests a narrowly defined method of inquiry.
None	None	Metacognitive Thinking	Students will evaluate the effectiveness of their project plan or strategy to determine the degree of their improvement in knowledge and skills.	We propose adding this domain of thinking based on input from Marshall faculty.
Quantitative Fluency	Abstract/ Mathematical Thinking	Quantitative Thinking	Students will analyze real-world problems quantitatively, formulate plausible estimates, assess the validity of visual representations of quantitative information, and differentiate valid from questionable statistical conclusions.	A significant number of degree programs did not map to the Quantitative Fluency outcome in the DQP. Yet, the domain of "Abstract/Mathematical" thinking was included as part of Marshall's original Core Domains and there is national consensus that quantitative fluency is an essential skill. Therefore, we developed the MU outcome to be more broadly stated than the ones in the DQP. The recommended domain name change from the original MU Core Domain wording to that of the DQP is recommended to emphasize the interdisciplinary nature of this domain
Applied Learning	None	None	N/A	Not explicitly included in our proposed Degree Profile. However, most assessments, especially at the capstone level, will require application.
Specialized Knowledge	None	None	N/A	Specialized Knowledge will be part of the outcomes of each degree program and, therefore, will differ among degree programs. However, it is expected that students will use specialized knowledge to demonstrate the domains of critical thinking.

Marshall University's official course syllabus policy (MUBOG AA-14), originally passed by the Board of Governors in 2006, requires that each course articulate expected student learning outcomes. With the intention of improving teaching and learning at the course level and explicitly aligning course outcomes to those of

appropriate degree programs and the DQP, Marshall's Provost established a Master Syllabus Task in fall 2011, making up the third Quality Initiative project. The work of this group resulted in the Board of Governors amending the syllabus policy on 8/14/2012 to include a grid explaining the learning activities provided for students to practice the knowledge/skills required to achieve each course learning outcome and the methods used to assess their achievement of each course learning outcome. This approval came after the Faculty Senate endorsed the amended policy in May 2012 (Refer to #Appendix VII for the Faculty Senate Recommendation and the Master Syllabus Template). At the time the Faculty Senate approved the changes to the Syllabus Policy, it had not yet approved the Marshall Baccalaureate Degree Profile.

II. Adequacy of the Program

1. Curriculum:

Description of Core Curriculum

Marshall's current core curriculum, approved by the University's Faculty Senate, consists of the following requirements:

- Core I: 9 hours
 - 3 hours: First Year Seminar (100-level)
 - 6 hours of discipline-specific courses with an emphasis on critical thinking and active learning (100- or 200-level).
- Core II: 25 hours (100- or 200-level)
 - o 6 hours: Composition
 - 3 hours: Communication
 - o 3 hours: Math
 - 4 hours: Physical or Natural Science
 - o 3 hours: Social Science
 - 3 hours: Humanities
 - o 3 hours: Fine Arts
- Additional University Requirements
 - o 6 hours of Writing Intensive credit in any discipline at any level
 - 3 hours of Multicultural or International coursework in any discipline at any level
 - Capstone project in the major

Core I: First Year Seminar

First Year Seminar (FYS) was launched in summer 2010 and is required of all of Marshall's freshmen. The course's catalog description is, "Students will learn integrative/critical thinking skills integral to life-long learning through discussion,

interaction, discovery, problem solving, writing, research, reflection, and examination of multicultural/international issues." The course, designed to be interdisciplinary in nature, provides students with active learning experiences that allow them to practice knowledge and skills in five of Marshall's nine outcomes. These include *Information Literacy* and *Integrative, Intercultural, Inquiry-Based, and Metacognitive Thinking.* Course instructors are full-time faculty members at Marshall University representing all undergraduate colleges within the university. Although each section of FYS may explore a different theme, learning outcomes are common across all sections of FYS and instructors must complete FYS pedagogical development before teaching the course. All FYS sections administer a common final exam in which students are asked to recommend an evidence-based solution to a problem or to take an evidence-based position on an issue.

Examples of themes covered by various FYS sections during the spring semester 2015 included: *Invention, Innovation, and the Entrepreneurial Spirit;* The Webs We Weave: Navigation in a Complex World; Surviving the Apocalypse; Practical Skills for College and Life; Getting the Most out of Marshall; Investigation; Memory; Exploration and Discovery; Social Media and Reality TV; Visual Culture; It's Your Life; Hacking: Pushing the Boundaries to Solve Difficult Problems; Trail Blazer Challenges; Challenge; Social Medial and Reality TV; How not to be a Chump; The Stories We Tell and the Work We Do; Let's Go to the Movies; Who Done It?; Life as an Experiment; Small Towns; One Life as an Experiment: The Journey of Theodor Seuss Geisel; Journeys-Physical, Spiritual, Real, and Imagined.

Core I: Critical Thinking Courses and Role of the General Education Council

In academic year 2009-2010 the Office of Academic Affairs established the General Education Council (GEC). The GEC consists of voting members, who are faculty from all undergraduate academic colleges and the University Library and ex-officio (non-voting) members from University College, Academic Affairs, Assessment, and the Center for Teaching and Learning. The GEC's charge was to review and make recommendations for approval (or not) of all courses at Marshall University wishing to be designated as critical thinking (CT), multicultural (MC) or international (INT). After the GEC makes recommendations, they are forwarded to the University Curriculum Committee, which forwards its recommendations to the University's Faculty Senate. After being approved by the Faculty Senate, recommendations are forwarded to Marshall's President for final approval.

Courses approved for CT designations must include course outcomes that align to the University's *Integrative Thinking* outcome ("Students will make connections and transfer skills and learning among varied disciplines, domains of thinking, experiences, and situations") and at least four additional university outcomes of

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their choosing. All departments wishing to have courses approved for critical thinking (CT) credit must submit the following paperwork to the General Education Council:

- Course addition form (for newly created courses) or course change form (for existing courses)
- CT Designator form: This form requires departments to specify the four university outcomes (in addition to *Integrative Thinking*) to which the course outcomes align. For each of the five university outcomes, it requires that the department explain how students will practice each outcome in the course. In other words, faculty preparing this course must show, to the satisfaction of members of the GEC, that students will be engaged in active learning experiences that will help them to make progress in achieving the university's outcomes. The form also must explain how student achievement of <u>each</u> of the five university outcomes will be assessed. Finally, the department must describe the course project that students will upload into GEAR to allow direct assessment of student learning at the university level.
- Copy of the syllabus for the proposed course

**The guidelines noted above were revised after the approval of Marshall's Baccalaureate Degree Profile. Prior to that time, CT courses had been asked to articulate course outcomes that aligned to at least two of Marshall's 2008 Domains of Thinking and at least three (out of a possible five) "CT" outcomes. These "CT" outcomes were reasoning, cultural judgment, representations, information literacy, and metacognitive reflection.

A second responsibility of the GEC is to re-certify all courses with CT designations using a five-year review cycle. For recertification, departments are required to submit the CT designator form and a current syllabus.

Prior to teaching an approved CT course, each faculty member MUST complete a Critical Thinking Workshop through the Center for Teaching and Learning.

Please refer to <u>#Appendix_VIII</u> for a list of current CT courses, showing date of initial approval, and date of review.

Core II

A university's education is built on a foundation of essential competencies which lay the groundwork for success in one's major field, in one's future career, and in one's community life. The Core II requirements provide that foundation through the study of writing, oral communication, natural science, math, social science, humanities and fine art. By introducing all students to these areas of study, Marshall University provides broad interdisciplinary studies as well as the focused depth of learning within a student's major. According to the Undergraduate Catalog "The Core Curriculum is designed to provide essential skills for students' varied life paths after college in an ever-evolving world". Many

career paths that will be traveled by Marshall's students have yet to be discovered. The Core II general education requirements provide foundational training to prepare students to adapt to our ever-changing world.

Each academic college is responsible for determining which courses (at the 100-or 200-level) are acceptable to fulfill Core II requirements. A list of approved Core II courses is included in #Appendix IX.

Additional University Requirements: Multicultural and International Courses and Role of the General Education Council

Courses approved for multicultural (MC) or international (INT) designations must include course outcomes that align to the two or more elements (traits) of the University's *Intercultural Thinking* outcome ("Students will evaluate generalizations about cultural groups and analyze how cultural beliefs might affect communication across cultures" [MC courses] or "Students will evaluate how specific approaches to global issues will affect multiple cultural communities or political institutions and will untangle competing economic, religious, social, political, institutional, or geographical interests of cultural groups in conflict" [INT courses]). All departments wishing to have courses approved for MC or INT credit must submit the following paperwork to the GEC (note that courses at the 100, 200, 300, and 400 levels may be approved):

- Course addition form (for newly created courses) or course change form (for existing courses)
- MC or INT Designator form: This form requires departments to explain how students will practice each element of *Intercultural Thinking* in the course. In other words, faculty preparing this course must show, to the satisfaction of members of the GEC, that students will be engaged in active learning experiences that will help them to make progress in achieving the elements of the university's *Intercultural Thinking* outcome that the course addresses. The form also must explain how student achievement of those elements of the university's *Intercultural Thinking* outcome will be assessed. Finally, the department must describe the project that students will upload into GEAR to allow direct assessment of student learning at the university level.
- Copy of the syllabus for the proposed course

A second responsibility of the GEC is to re-certify all courses with MC and INT designations using a five-year review cycle. For recertification, departments are required to submit the MU or INT designator form and a current syllabus.

Please refer to <u>#Appendix_X</u> for a current list of MC and INT courses, showing date of initial approval, and date of review.

Additional University Requirements: Writing Intensive Courses and Role of the Writing across the Curriculum Program

Courses that carry writing intensive (WI) designations represent the only course type that can be approved on either a course or an individual faculty basis. However, programs that previously had difficulty certifying enough instructors through Option A have found that certifying them through Option B (described below) has worked better for them than certifying courses. Therefore, Marshall currently does not have WAC certified courses, but WAC certified instructors. This approval process is coordinated through the Writing across the Curriculum (WAC) Committee. This committee consists of the WAC Director (a faculty member with ¼ reassigned time who works with the Executive Director of the Center for Teaching and Learning), WAC certified faculty from the Colleges of Business, Arts and Media, Liberal Arts, Science, Education, Health Professions and the Director of the University's Writing Center.

To become certified to teach a WI course at Marshall University, faculty must first participate in a WAC Workshop facilitated by the WAC Director and approved by the Center for Teaching and Learning. Following the workshop, faculty who wish to pursue certification have two potential certification routes.

Option A consists of developing a WAC portfolio. The Option A certification process requires the submission of a reflection, student artifacts, and approval of the Marshall University WAC committee. Option A certification may be pursued only by individuals who have instructed at least one course utilizing the WI principles. The Option A portfolio certification is to be completed via the Blackboard Organization page and through the approval of the WAC committee. This process often involves at least one draft and a final submission. Courses taught by Option A certified faculty members do not need prior approval of the WAC director to receive the WI designation. This portfolio consists of:

- Cover Sheet with required signatures
- Examples of course syllabi and assignment sheets
- Examples of written assignment instructions, writing criteria or checklists provided to students
- Course outcomes that explicitly mention improvement of writing
- Evidence that the professor provides students with appropriate guidance through the writing process
- Evidence that the professor requires at least two different writing assignments involving different kinds of writing
- Evidence that the professor guides students through the revision process
- Evidence that at least one assignment requires the students to produce finished, edited prose
- Evidence that writing assignments are worth at least 50% of the course grade
- Evidence that informal writing is used to improve writing skills
- Evidence that writing assignments are distributed throughout the course

Examples of student work

campus workshop

Option B certification requires that a syllabus and syllabus evaluation form be submitted to and approved by the WAC director. Option B certification may be pursued the semester after attendance at a WAC Training Session. Option B certified faculty must submit all materials to the WAC director each semester before a WI designation can be added to a course. Instructors utilizing Option B certification must have every course approved every semester that it is taught, and Option B instructors are also subject to the same recertification standards as Option A instructors (every three years). All courses taught under Option B certification must meet the same standards as those that are taught under Option A.

The WAC committee has established guidelines (revised on April 7, 2006) for faculty to *continue* as WAC certified professors. Additionally, WAC certified faculty are required to re-certify every three years. To *continue* as WAC certified professors, faculty must submit syllabi and assessment documents each semester they teach a WI course. To re-certify, faculty may choose one of four routes. All routes require the faculty member to submit a syllabus that meets WI requirements each semester the WI course is taught and to participate in WAC assessment, as requested, for WI courses. In addition to these requirements, choices are:

Route One O Every three years from the date of certification or re-certification, submit a reflection on his/her challenges as a WAC instructor and his/her best WAC practice, a rationale for this practice, the handouts for this practice and some student samples of work to the WAC director Route Two O Present best practices and challenges by helping facilitate and/or attending a fall WAC workshop OR special all day event writing workshop sponsored by WAC with reflection Route Three O Present a portfolio and help facilitate a spring portfolio workshop Route Four O Every three years from the date of certification or re-certification, read, review, and lead discussion of a book/article that is a good resource for WI teaching in a WI on-campus workshop or present a best practice in an on-

Please refer to <u>#Appendix XI</u> for a list of WAC certified instructors for the period of the review by Academic College and Program.

Additional University Requirements: Capstone Experience and Role of Degree Programs

The final additional university requirement is that, to earn a baccalaureate degree, each student must complete a capstone project in his/her major. Capstone projects are determined by each degree program. Capstone projects range from individual or group research and/or creative projects to internship experiences. Students are often required to present the results of creative and research projects. In some cases, students are able to fulfill the capstone experience through paid work experiences. A detailed list of capstone projects is included in #Appendix_XII.

2. Faculty:

The Core Curriculum is administered by faculty and administrators through the University's shared governance structure. The first section of this report detailed the process and faculty groups involved in approving the Core Curriculum. The ongoing administration of the program involves these offices and faculty:

- Provost and Senior Vice President for Academic Affairs: As the chief academic officer of the University, the Provost is responsible for all of the University's academic programs. Through the Office of Academic Affairs he provides stipends for faculty who complete the FYS Institute and funds for FYS classroom activities.
- Associate Vice President for Academic Affairs and Dean of Undergraduate Studies: The Associate VP for Academic Affairs and Dean of Undergraduate Studies is responsible for making sure that FYS is adequately staffed each semester and that all freshmen complete the course. She works with the Executive Director of the Center for Teaching and Learning and with the FYS coordinator to evaluate the effectiveness of the program.
- Executive Director of the Center for Teaching and Learning: The
 Executive Director of the Center for Teaching and Learning (CTL) cofacilitates the FYS Institute with the FYS Coordinator. The CTL Executive
 Director also facilitates faculty development for instructors who wish to
 become certified to teach Core I CT courses. The CTL Faculty Development
 Office offers one face to face workshop and one online workshop per
 semester. For example, the latest face to face workshop was held March 5,
 2016 from 8:00-4:00 and the online workshop ran from August 22-28, 2016.
 In the workshops, participants prepare a course to meet the CT criteria
 relating to course outcomes, pedagogy, and assessments.
- FYS Coordinator: The FYS coordinator works with the Executive Director of
 the CTL to co-facilitate a faculty institute to assist future FYS instructors in
 developing an effective interdisciplinary course design and in teaching the
 course for the first time. The Institute consists of a combination of three face
 to face meetings (five hours each) and seven online modules. Upon
 completion of the Institute and submission of a complete syllabus and course
 design plan, participants receive a stipend of \$1,800. Active FYS faculty also

receive an iPad for use in the classroom and must agree to teach at least four sections of FYS. The FYS coordinator also leads groups of faculty who develop the common problem-solving based FYS final exams and she coordinates administration of these exams each semester through Blackboard Learn. Finally, the FYS coordinator chairs FYS faculty meetings and serves as a resource for all FYS faculty.

- Director of the Writing across the Curriculum Program: The Director of Writing across the Curriculum (WAC) program facilitates WAC workshops and chairs the committee that reviews WAC portfolios, both for initial and recertification.
- For the period fall 2010 through spring 2016, 929 different faculty members taught 9,996 sections of courses with the following attributes: Core I (FYS and CT), Core II (Composition, Social Sciences, Humanities, Oral Communication, Mathematics, Physical and Natural Science, and Fine Arts), and courses that allow students to fulfill additional requirements of the Core Curriculum (MC, INT, and WI).

3. Students:

- Marshall University's entrance standards for freshmen
 - According to Marshall University's Undergraduate Catalog for academic year 2014-2015, for admission to the freshman class at Marshall University, recent high school graduates must submit:
 - A high school diploma (official transcript with graduation date required)
 - An Overall Grade Point Average of at least 2.00 on a 4.00 scale and a composite score of at least 19 on the ACT or a combined score (critical reading + math) of at least 900 on the SAT; OR An Overall Grade Point Average of at least 3.00 on a 4.00 scale and a composite score of at least 16 on the ACT or a combined score (critical reading + math) of at least 770 on the SAT
 - Marshall recommends completion of Higher Education Policy Commission (HEPC) core requirements:
 - 4 units of English (including English CR and courses in grammar, composition, and literature);
 - 4 units of mathematics (three units must be Algebra I and higher or Math I or higher; Transitional Math for Seniors will also be accepted)
 - 3 units of social studies (including U.S. history)
 - 3 units of science (all units must be college-preparatory laboratory science, preferably including units from biology, chemistry, and physics)
 - 2 units of foreign language (two units of the same foreign language; sign language is also acceptable)
 - 1 unit of arts

Students seeking admission to four-year degree programs must earn credit for the courses listed above. Applicants who have not completed the HEPC course requirements may be admitted, but must complete commensurate college-level coursework prior to degree completion. New students are asked to consult an academic advisor for specific course requirements. First-time freshmen pursuing a four-year baccalaureate degree who meet all admission requirements are admitted unconditionally. A very limited number of students who do not meet the GPA, ACT/SAT, or HEPC general requirements for admission are admitted conditionally to University College. Under the terms of the admissions policy, only a limited number of conditionally admitted students are permitted to enroll at Marshall. Students who do not meet the general or conditional requirements may appeal the decision through the Admission Appeals Committee.

Conditionally admitted students must complete specific requirements within three semesters:

- For students having Verbal ACT scores of less than 18 (Critical Reading/Verbal SAT less than 450), successful completion of required prerequisite English course.
- For students having Math ACT scores of less than 19 (Math SAT less than 460), successful completion of required prerequisite math course(s).
- o Successful completion of academic support class (UNI 101).
- Completion of 18 graded hours with a 2.00 GPA (cumulative and MU). Upon completion of the requirements, the student may transfer into any major/college for which s/he is eligible. Some majors and colleges require separate applications and have additional requirements for admission into their programs.
- **Persistence and Graduation Rates**: Data show that, for freshmen entering Marshall during the five year period before the implementation of the Core Curriculum (2005-2009), freshman to sophomore fall to fall persistence ranged from a high of 73% for freshmen who entered Marshall in fall 2005 to a low of 70% for freshman who enrolled at Marshall in fall 2007, 2008, and 2009, with the modal retention figure hovering around 70%. For the first three years after the implementation of the Core Curriculum (2010, 2011, and 2012) freshman to sophomore fall to fall persistence remained around 70%; however, beginning with freshmen who entered Marshall in 2013, retention started to rise, with a 72% retention rate for those who enrolled in 2013 and a 73% rate for those who enrolled in 2014. We note that Marshall launched the Education Advisory Board's Student Success Collaborative in fall 2012. There are no data yet for six-year graduation rates for students who entered Marshall after the implementation of the Core Curriculum, but four-year graduation rates for students who enrolled in 2010, 2011, and 2012 were 26%, 29%, and 25% respectively. Of note is that the highest four-year graduation rate for students who entered Marshall between 2005 and 2009 was 24%.

We also note that freshmen who entered Marshall with ACT or SAT scores high enough for full admission (16-19 depending on high school GPA) and

high school grade point averages (GPA) of at least 3.25 have consistently persisted and graduated at significantly higher rates than have both fully admitted students with high school GPAs that were less than 3.25 and conditionally admitted students. Persistence and graduation rates were similar for the latter two groups. Please refer to #Appendix XIII for a breakdown of these figures.

Entrance Abilities of Freshmen and College GPA the Time of Graduation **Analyzed by Successful Four-Year Graduation and Student** Classification (Fully Admitted High Performing Students [HS GPA > 3.25]; Fully Admitted Low Performing Students [HS GPA < 3.25]; and Conditionally Admitted Students): Mean composite ACT scores for students who graduated within four years and those who did not graduate within that timeframe remained fairly consistent during the review period. For four-year graduates, mean composite ACTs ranged from a high of 24.25 for students who entered Marshall in fall 2006 to a low of 23.28 for students who entered Marshall in fall 2012. For students who did not graduate within four years, composite ACT scores were lower, ranging from a high of 21.13 for students entering Marshall in fall 2007 to a low of 20.44 for students entering Marshall in fall 2010. While entering ACT scores were consistently higher for graduates than for non-graduates for fully admitted high performing students, these differences were smaller for fully admitted low performing students, and mean composite ACT scores were consistently lower for conditionally admitted students who graduated in four years than for those who did not (however, the number of conditionally admitted students who graduated within four years was quite small). High School GPA was consistently higher for graduates than for non-graduates overall. As with ACT, differences were smaller for fully admitted low performing than for fully admitted high performing students. For conditionally admitted students, differences were less consistent, but for this group high school GPA appeared to be a better predictor of success than did composite ACT. Please refer to #Appendix XIV for a breakdown of these figures.

4. Resources Used by Core Curriculum

Personnel

 FYS Course Instructors: Since its inception119 different instructors have taught a total of 572 sections of FYS. The breakdown by academic college or other unit by number of instructors and sections is as follows

Academic Unit	Number of Instructors	Number of Course Sections
CAM	24	137
CITE	7	23
LCOB	9	44
COEPD	8	40
COHP	8	21
COLA	32	192

COS	26	93
University Libraries	2	9
INTO	1	1
MOVC	1	9
Unknown	1	3
Totals	119	572

Of note is that the Colleges of Liberal Arts, Arts and Media, and Science have taught a total of 422 (74%) of the 572 sections and have contributed a total of 82 (69%) of the 119 faculty.

- o Financial Resources CT Course Training: Since the fall of 2010 a total of 370 faculty have registered for CT Course Development through the Center for Teaching and Learning. Of these faculty, 271 have successfully completed the training. Faculty who completed CT training were originally paid stipends of \$150.00 each. The first stipends were awarded in July 2010 and the last in fall 2012. Records show that 34 faculty received these stipends for a total of \$5,100 plus benefits.
- o Financial Resources FYS Course Training: To prepare for the launch of the Core Curriculum, faculty development for FYS began in spring 2010. Initially, faculty were given a one-semester course reassignment to complete FYS training. Later, faculty were allowed to choose between a course reassignment and a stipend. In either case, cost of training FYS faculty amounts to approximately \$1,800 per person. This amount was paid to the faculty member's academic department to cover a course reassignment or directly to the faculty member in the form of a stipend. Of the 119 faculty who have taught FYS, one was the Executive Director of the Center for Teaching and Leaning who originally developed and facilitated the training. This leaves 118 faculty members who taught FYS during the review period who received training. At \$1,800 per person, this amounts to a total expenditure of \$212,400 plus benefits.
- Additional Expenses recorded by the Office of Academic Affairs:
 Below is a spreadsheet provided by the Office of Academic Affairs Budget
 Office regarding direct expenditures.

Budget Line			Fiscal Year	*	
	2012	2013	2014	2015	2016
Office Expenses			\$1,429.41	\$27.98	
Subscriptions				\$7,450.00	
Educational Supplies				\$173.25	\$61.45
Computers				\$4,774.20	
Telephone				\$2,000.00	
Equipment					
Student Activities					\$49.77

Off Campus				\$385.00	
Instruction Travel					
Hospitality				\$52.17	
Misc. Equipment		\$11,940.00	\$783.73	\$729.97	
Freight				\$12.19	
Computer Supplies	\$4,000.00	\$1,327.00	\$7,519.00	\$1,589.69	
Total Expenditures					
	\$4,000.00	\$13,267.00	\$\$9,732.14	\$17,194.45	\$111.22

5. Assessment Information:

Core Curriculum Assessment Plan: The assessment plan for the Core
 Curriculum consists of direct and indirect assessments of student learning.
 Direct assessment is designed to evaluate students' progress in achieving the
 outcomes specified in Marshall's Baccalaureate Degree Profile by directly
 assessing their work, while indirect assessment asks students to evaluate or
 express levels of agreement with aspects of their learning.

Direct Assessments of the Core Curriculum:

Collegiate Learning Assessment (CLA/CLA+): Marshall has been administering the CLA in a cross-sectional format (i.e., to samples of incoming freshmen and graduating seniors) each year since academic year 2004 – 2005. The CLA measures the institution's value-added in helping its students to develop the ability to reason analytically and to solve problems (which align with Marshall's Inquiry-Based Thinking and Information Literacy outcomes) and to write effectively (which aligns with Marshall's Communication Fluency outcome). In 2013, the Council for Aid to Education introduced the *CLA*+. The *CLA*+ consists of a performance task and a series of selected response questions. According to the Council for Aid to Education, "the performance task presents students with a real-world situation that requires a purposeful written response. Students are asked to address an issue, propose the solution to a problem, or recommend a course of action to resolve a conflict. They are instructed to support their responses by using information provided in a Document Library. This repository contains a variety of reference materials, such as technical reports, data tables, newspaper articles, office memoranda, and emails. In the second part of the CLA+, students are asked to answer 25 selected response questions. Ten questions measure scientific and quantitative reasoning, and ten measure critical reading and evaluation. Another five questions call for students to critique arguments by identifying logical flaws and questionable assumptions. Like the performance task, the 25 selected response questions are document-based and require students to draw information from provided materials." A major challenge at Marshall has been to draw representative samples to ensure that our results are valid. The baseline/senior assessment (addressed in the section below) was developed partially to address this issue; beginning in academic year 2012-2013 we began to require

that either it or the *CLA/CLA*+ be completed by all incoming freshmen attending Week of Welcome (and freshmen from that group are randomly assigned to take one or the other assessment). Recruiting seniors for the spring sample has proven more difficult. In spring 2013, we made "senior assessments" a campus-wide activity on Assessment Day and asked each academic college to organize its administration. Random assignment of students to the CLA/CLA+ and to the Marshall senior assessment (the same as the baseline assessment) was made. However, actual student attendance at these sessions remained a problem. So, beginning in spring 2015, the Office of Assessment began to reach out to capstone instructors, asking them to encourage or require seniors in their capstone classes to complete one of the assessments. This resulted in a more representative senior sample for the CLA+ in the spring of 2015. For academic year 2014-2015. freshmen and senior samples did not differ significantly from their respective populations in terms of gender, race, Honors College enrollment, entering academic ability (ACT/SAT), high school GPA (freshmen) or college GPA (seniors). Readers can access these comparisons, as well as those for other academic years, at www.marshall.edu/assessment/GenEdAssessment.aspx.

Baseline/Senior Assessment: To assess student outcomes that align with three of Marshall's learning outcomes (Inquiry-Based Thinking, Communication Fluency, and Information Literacy), core groups of Marshall faculty, under the direction of staff from the Center for Teaching and Learning, have developed an in-house assessment modeled on pedagogy learned through participation in two CLA Performance Task Academies. The assessment scenarios they developed use real-world issues that require students to grapple with questions/problems for which there could be more than one solution. Students are asked to make a recommendation for a particular course of action to solve a problem or to resolve an issue in the form of a memorandum after carefully analyzing information in several documents provided to them. They also are asked to indicate evidence they would like to have to make this recommendation that was not provided in their packet of documents. As noted in the previous section on the CLA/CLA+, these assessments are given to incoming freshman during the University's Week of Welcome (baseline) and to graduating seniors as part of the University's Assessment Day activities. In spring 2013 and spring 2014, these assessments were randomly assigned to seniors to complete on Assessment Day. As mentioned in the previous section, beginning with spring 2015 the Office of Assessment began organizing and administering senior assessments earlier in the spring semester by working with capstone instructors. Since the CLA+ uses a valueadded methodology to evaluate the effectiveness of Marshall in

providing an education that improves its students' abilities to analyze issues, solve problems, and write effectively, it is important that the majority of the seniors in the *CLA*+ sample have completed at least the majority of their coursework at Marshall. Therefore, although it has its own problems, beginning in the spring of 2015 the Marshall developed senior assessment was primarily completed by seniors who were transfer students; however, in the spring of 2016 only about half were transfer students.

- **FYS Final Exam**: The problem-based assessments developed by Marshall and described in the section on baseline/senior assessment were adopted as common final exams for all sections of FYS beginning in fall 2012. During academic year 2012-2013, the final exam scenarios were similar to those used during the baseline/senior assessment. However, in addition to being asked to evaluate documents to make a recommendation and to determine if additional information would have been helpful in arriving at this recommendation, during the FYS final exam, students are asked to explicitly evaluate each document they are given to read for accuracy, bias, and relevance. Beginning in academic year 2014-2015, the FYS final exam, while remaining similar to the baseline and senior assessments, are completed online by students within the Blackboard Learn System. Using the Marshall generated assessments given to incoming freshmen (baseline), to freshmen at the end of FYS (FYS final exam), and to graduating seniors (senior) allows us to compare differences among these groups in outcomes that align to Inquiry-Based Thinking, Information Literacy, and Communication Fluency.
- **GEAR Authentic Artifact Assessment:** Complementing the baseline/FYS/senior assessments and the CLA/CLA+, we assess student work from course assignments. Students in selected classes that are part of the general education core are asked to upload their work into the University's General Education Assessment Repository (GEAR) each semester. GEAR was first used during academic year 2010-2011, with the first pilot assessment of artifacts from the university's newly created interdisciplinary first-year seminar (FYS) occurring during the summer of 2011. Some of the recommendations from that assessment were incorporated into the University's Quality Initiative, resulting in the development and adoption of Marshall's Degree Profile learning outcomes. The second pilot assessment of FYS artifacts using the Degree Profile's learning outcomes occurred in May and June of 2013. Specific recommendations for updating the GEAR upload process and adding additional courses for general education assessment were made. We now have a process in place where artifacts uploaded to GEAR are assessed on an annual basis. However, recommendations from the 2014 assessment included

assessing artifacts that aligned to specific university outcomes on a three-year rotating cycle. The General Education Assessment Workgroup felt that this was necessary to allow us to assess larger numbers of artifacts that aligned to each outcome. At this time, not all courses included in the Core Curriculum upload work to GEAR. We continue to add courses incrementally. Please refer to the chart below for more information.

Learning Outcome	Where Assessed	Added in Academic Year 2014-2015	Recommended Future Additions
Communication Fluency	Writing Intensive Courses Core II Composition Courses; separate from GEAR Core II CMM 103; separate from GEAR	CT courses	Selected capstone courses
Creative Thinking		CT courses	Core II Fine Arts and Humanities courses; selected capstone courses
Ethical and Civic Thinking	Service Learning Courses	CT courses	Core II Social Science courses; selected capstone courses
Information Literacy	FYS Library Assessment; separate from GEAR Core II CMM 103; separate from GEAR	CT courses	Selected capstone courses
Inquiry-Based Thinking	FYS Core II CMM 103; separate from GEAR	CT courses	Core II Physical, Natural, and Social Science Courses; selected capstone courses
Integrative Thinking	FYS	CT courses	Selected capstone courses
Intercultural Thinking	FYS, International, Multicultural courses	CT courses	Selected capstone courses
Metacognitive Thinking	FYS	CT courses	Selected capstone courses
Quantitative Thinking		CT courses	Core II mathematics courses; selected capstone courses

- Core II: Oral Communication: The Communication Studies Department has conducted oral communication assessment throughout this review period, with their assessment dating back at least to academic year 2002-2003 and perhaps earlier. When assessing their students' oral communication skills, they assess outcomes that align to Marshall's Communication Fluency, Inquiry-Based Thinking, and Information Literacy outcomes.
- Core II: Written Communication: The English Department has conducted written communication assessment since the spring 2014 semester. Students enrolled in ENG 201, Advanced Composition, upload their research papers to an "organization" in Blackboard. The papers are assessed during departmental workdays in January (for work done in the fall semester) and May (for work done in the spring). The results are shared with the department's Assessment Committee and Composition Committee; the Composition Committee then discusses what changes, if any, will be made in light of the data they receive.

The Department of English would like to change the process, so that more work can be assessed and each assignment can be read by multiple assessors, as is the case with the other assessments that are undertaken by a faculty workgroup during the summer. Funding for this project has been approved by Academic Affairs and the new program will be piloted in the summer of 2017.

Library Assessment: University Libraries has conducted assessment of students' abilities to use and evaluate information literacy resources, aligning to Marshall's *Information Literacy* outcome. Over the review period, the Library has conducted iSkills, a standardized assessment developed by the Educational Testing Service (ETS) and, more recently, a Marshall developed assessment of Information Literacy that is delivered within the Blackboard Learn environment.

Indirect assessment of the Core Curriculum:

Course Syllabus Approval and Evaluation (Curricular): Although the University Assessment Committee evaluates syllabi for adherence to the MUBOG Syllabus Policy, it has not conducted specific evaluations of syllabi for courses that are part of the Core Curriculum. However, the Assessment Office conducted informal evaluation of CT syllabi after the passage of the Baccalaureate Degree Profile in 2013. This perusal showed that some CT syllabi aligned to at least two of Marshall's 2008 Domains of Thinking and at least three of the five CT outcomes; others aligned only to 2008 Domains of Thinking, others aligned only to CT outcomes, and some did none of the above. The Assessment Office and the Center for Teaching and Learning collaboratively developed a chart to help CT courses convert their outcomes from the 2008 Domains/CT outcome model to the new Baccalaureate Degree Profile model. Following this, the Assessment Office met with chairs of all programs that offered CT courses in fall 2013, asking that syllabi for CT courses convert to the new language by fall 2014. Additionally, all faculty who participate in faculty development to teach either FYS or CT courses complete syllabi appropriate for these courses under the direction of staff from the Center for Teaching and Learning and, in the case of FYS, of the FYS Coordinator. The FYS Coordinator also provides an FYS syllabus template on the FYS website www.marshall.edu/fys/first-yearseminar/faculty/. Additionally, before CT, MC, and INT courses are approved, the course proposals, which include a course syllabus, must be approved by the General Education Council. Syllabi for WI courses must be approved by the WAC Committee.

National Survey of Student Engagement (NSSE: Curricular and Co-Curricular): The NSSE is a nationally normed indirect assessment of student learning and engagement and is administered during the spring semester. Marshall has given this survey to its freshmen and seniors since 2008. From 2008 through 2012, the survey included items that aligned to five benchmark areas: Level of Academic Challenge, Active and Collaborative Learning, Student-Faculty Interaction, Enriching Educational Experiences, and Supportive Campus Environment. The survey was revised in 2013 to include four themes, each with a set of engagement indicators and a separate report for high impact practices. The chart below shows the alignment between the benchmark areas from 2008-2012 and the themes/engagement indicators and high impact practices for 2013-2015.

Benchmark Areas (2008-2012)	Themes (2013-2015)	Engagement Indicators (2013- 2015)	High Impact Practices (2013-2015)
Level of	Academic	Higher-Order Learning	
Academic	Challenge	Reflective and	
Challenge		Integrative Learning	
		Learning Strategies	
		Quantitative	
		Reasoning	
Active and	Learning with	Collaborative Learning	
Collaborative	Peers	Discussion with	
Learning		Diverse Others	

Student- Faculty Interaction	Experiences with Faculty	Student-Faculty Interaction Effective Teaching Practices	
Enriching Educational Experiences			Learning community or some other formal program where groups of students take two or more classes together Courses that included a community-based project (service learning) Work with a faculty member of a research project Internship, co-op, field experience, student teaching, or clinical placement Study abroad Culminating senior experience (capstone course, senior project or thesis, comprehensive exam, portfolio, etc.)
Supportive Campus Environment	Campus Environment	Quality of Interactions Supportive Environment	

- Degree Program and Core Curriculum Surveys (Curricular): The Degree Program survey is a short survey that was given during Assessment Day activities in 2014. It used the items from the undergraduate graduation survey that aligned to the outcomes of Marshall's Degree profile and asked students to express their level of agreement with the statements. The unique aspect of this survey was that it specifically asked their level of agreement for courses that were part of the Core Curriculum and for courses that were part of their Degree Programs. The survey was not repeated in spring 2015 because, for degree programs, it was redundant with the graduation survey completed by graduating seniors. In spring 2016 it was revised to specifically address the Core Curriculum, renamed the Core Curriculum survey, and included open-ended feedback from students. Please see #Appendix XV for copies of both survey instruments.
- Undergraduate Graduation Surveys (Curricular): Each year graduating seniors are invited to complete a graduation survey.

Among other things, students are asked to rate their level of agreement with Likert-Scale items, some of which align to the outcomes articulated in Marshall's Degree Profile. Although this survey was administered throughout the reporting period, the wording of several of the Likert Scale items was revised for in 2012 in an attempt to bring greater objectivity to student responses. A copy of basic survey (which has additional questions for many colleges and degree programs) is included in #Appendix XVI. Each year, results of the Graduation survey are shared university-wide and with academic colleges. Results for specific degree programs are now being shared with them for inclusion in their five-year program reviews.

- Freshman Survey (Curricular): In December 2015 the Office of Assessment administered a survey to all freshmen. This survey had two purposes; the first was to conduct an indirect assessment of four high impact practice learning communities and the second was to conduct an indirect assessment of student learning in FYS. A copy of this survey is included in #Appendix_XVII.
- Assessment Day Focus Groups (Curricular): Focus Groups were held on Assessment Day in 2011 and 2013 to answer the question, "What makes a good classroom learning experience?" On Assessment Day 2012 the Focus Group question was, "How can university advising and other support services help you to achieve your academic and personal goals?"
- Writing Intensive Program Evaluation: The Writing Intensive Program surveyed students to determine which aspects of the writing intensive pedagogy were working best and which were in need to strengthening. Results were posted in 2011. Direct assessments of student work were evaluated by members of the Summer Assessment Team in 2015 and 2016.

Core Curriculum Assessment Results

Direct Assessment

CLA/CLA+: During the reporting period, the CLA transitioned to the CLA+, complicating the comparison of results across years. However, one finding was consistent; for each year Marshall's estimated "value-added" (our contribution to students' abilities to reason analytically, solve problems, and write effectively) was near the expected level. Value-added scores are given in the table below. Please note that scores between negative (-) 1.0 and positive (+) 1.0 are considered to be "near the expected level." According to Marshall's Spring 2016 CLA+ Results Institutional Report (found at

www.marshall.edu/assessment/GenEdReports/2016CLAInstitutionalReport.pdf), "value-added estimation using hierarchical linear modeling (HLM) provides standard errors which can be used to compute a unique 95% confidence interval for each school. These standard errors reflect variation in EAA (entering academic ability) and *CLA*+scores within and between schools and are most strongly related to senior sample size." (p. 34).

Year	# of test takers	Mean entering academic ability (on SAT scale)	Value Added Level	Value Added Score	95% Confidence Interval
2010-	96 seniors	1093 seniors	Near Expected	+0.93	+0.33 to +1.53
2011	102 freshmen	1052 freshmen			
2011-	83 seniors	1104 seniors	Near Expected	-0.06	-0.63 to +0.51
2012	101 freshmen	1049 freshmen			
2012-	99 seniors	1061 seniors	Near Expected	-0.10	-0.62 to +0.42
2013	102 freshmen	1016 freshmen			
2013-	47 seniors	1087 seniors	Near Expected	+0.30	-0.45 to +1.05
2014	116 freshmen	1046 freshmen			
2014-	97 seniors	1055 seniors	Near Expected	-0.11	-0.66 to +0.44
2015	133 freshmen	1013 freshmen			
2015-	106 seniors	1040 seniors	Near Expected	-0.07	-0.58 to +0.44
2016	59 freshmen	1031 freshmen			

We note that the first class to enter Marshall under the Core Curriculum did so during academic year 2010-2011. Therefore, for most of the entering students (although not all), their first opportunity to take the *CLA* would have been in the spring of 2014. However, because many of Marshall's students take longer than four years to graduate and until spring 2015 we did our best to restrict senior CLA participants to non-transfer seniors who planned to graduate during the calendar year of administration, it is unlikely that the majority of CLA completers entered Marshall under the Core Curriculum.

The results in the chart above show no significant differences in Marshall's value-added over the reporting period. However, in addition to interpretation of these results being complicated by the possibility that the majority of seniors who completed the assessment entered Marshall under the Marshall Plan, there are two other complicating factors; 1) the test underwent significant changes beginning in the 2013-2014 academic year, and 2) academic year 2014-2015 was the first year we began to draw seniors from capstone classes, which resulted in our first group where there were no significant differences between the CLA-eligible population of seniors and the CLA+ sample on gender, race/ethnicity, Honors College enrollment, entering academic ability (on ACT scale) and overall college GPA. During academic year 2015-2016, there was a higher percentage females in our sample than in the population and our sample had a significantly higher college GPA (3.4) than the population (3.2). We need to maintain a sampling strategy that eliminates self-selection and monitor

results over the next five years and record the incoming catalog year of all participating seniors.

Additionally, the new *CLA*+, launched in academic year 2013-2014, provides information regarding the average level of achievement of the freshman sample and the senior sample on a four-point scale (*below basic, basic, proficient,* and *advanced*). Mean performance for our freshman samples for 2013-2014, 2014-2015, and 2015-2016 was *basic* and mean performance for our senior samples for the same three administrations was *proficient*. Please refer to <u>#Appendix_XVIII</u> for Marshall's *CLA*+ Institutional Report for Academic Year 2015-2016 (without appendices). All other *CLA/CLA*+ Institutional Reports and *CLA/CLA*+ Sample/Population comparisons can be found at www.marshall.edu/assessment/GenEdAssessment.aspx.

- Freshman Baseline/Marshall Senior Assessments: We compared results of the past four years (2012-2013, 2013-2014, 2014-2015, and 2015-2016) of senior assessments with baseline assessments from Week of Welcome using different students, but the same tests. For Marshall's test, evaluators were blind to student status. For Marshall's test, we have seen statistically significant improvement in all aspects of critical thinking, information literacy, and communication fluency. The same issues with interpretation that apply to the CLA/CLA+ apply to these results.
- Freshman Baseline/FYS Final Exams: Comparing results of the past four years of FYS final exams with those of baseline assessments from Week of Welcome (direct comparison using same students) showed significant improvement in students' abilities to use and acknowledge evidence when taking a position or making a recommendation regarding an issue/problem. For academic year 2015-2016, mean improvement was seen for all elements of *Information Literacy* and *Inquiry-Based (Critical) Thinking*. Please refer to #Appendix XIX for an executive summary report of the Baseline/FYS/Senior Assessment Report for academic year 2015-2016. Reports for academic years 2014-2015, 2013-2014 and 2012-2013 can be found at www.marshall.edu/assessment/GenEdAssessment.aspx.

GEAR Authentic Artifact Assessment:

✓ Communication Fluency with Emphasis on Writing Intensive Courses: Analysis of writing from authentic student work with a focus on writing intensive courses for academic years 2013-2014 and 2014-2015 has shown mean performance using Marshall's rubric for Communication Fluency to range from 1.5 to 2.6 on a 5-

- point scale (0-4). Performance for students enrolled in 300-400 level classes has consistently been significantly higher than performance of students enrolled in 100-200 level classes. These results have been consistent for two years. We note that Marshall's graduates are expected to achieve level 3 (on a scale of 0-4).
- Intercultural Thinking with Emphasis on Multicultural and International Courses: Analysis of authentic student work with a focus on Multicultural and International courses for academic years 2013-2014 and 2014-2015 has shown mean performance using Marshall's rubric for Intercultural Thinking to range from 1 to 1.8 on a 5-point scale (0 4). Performance for students was the same regardless of course level or class rank of student. These results have been consistent for two years, despite the low number of artifacts assessed in 2013-2014. We note that Marshall's graduates are expected to achieve level 3 (on a scale of 0 4). We also note that, for some traits of the Intercultural rubric (Communication with individuals from other cultures and global awareness) a large number of artifacts were judged to be misaligned, i.e. not to address these traits.
- ✓ Ethical and Civic Thinking with Emphasis on Service Learning Courses: Analysis of authentic student work with a focus on service learning courses for academic years 2013-2014 and 2014-2015 has shown mean performance using Marshall's rubric for Ethical and Civic Thinking to range from 1 to 2 on a 5-point scale (0 4). We note that the majority of artifacts came from 300-400 level courses. These results have been consistent for two years, despite the low number of artifacts assessed in 2013-2014. We note that Marshall's graduates are expected to achieve level 3 (on a scale of 0 4). Although we assessed artifacts that aligned to Marshall's other outcomes in 2014, I do not think we have enough evidence to draw conclusions about student performance at this time. The executive summary of the GEAR Assessment report for academic year 2014-2015 is included in #Appendix XX.
- ✓ 2015-2016 Results: The overall strength for students was in Information Literacy: relevance of information (mean = 2.45) and overall weakness was in Integrative Thinking (means ranged from 1.44 [relation among domains of thinking] to 1.96 [connections among disciplines]). The 2015-2016 executive summary is included in #Appendix XXI. All previous GEAR reports are available at www.marshall.edu/assessment/GenEdAssessment.aspx.
- Core II: Oral Communication Assessment: During academic year 2014-2015 the oral communication program established the following learning outcomes for students in CMM 103 (Fundamentals of Speech Communication). Students will
 - ✓ Recognize communication as a transactional process

- Demonstrate critical thinking in both the production and evaluation of spoken messages
- ✓ Produce organized informative persuasive messages
- ✓ Demonstrate effective extemporaneous speaking skills

These outcomes also were used in academic year 2015-2016, when the program randomly sampled 266 speeches for evaluation, with two raters per speech (three raters were used during 2014-2015). Results showed that 88% (up from 50% in 2014-2015) of the speeches met the first outcome (Recognize communication as a transactional process), 88% (up from 51% in 2014-2015) of students met the second outcome (Demonstrate critical thinking in both the production and evaluation of spoken messages), 72% (up from 39% in 2014-2015) of speeches met the third outcome (produce organized informative persuasive messages), and 82.5% (up from 74% in 2014-2015) of speeches met the third outcome (Demonstrate effective extemporaneous speaking skills). These results suggest that the improvements made to the course based on assessment results from academic year 2014-2015 had a positive result. However, aware that improvement in learning is a continuous process, the program has identified areas in need of improvement during 2016-2017. For a detailed report, please refer to #Appendix XXII. Oral Communication assessment reports for previous years can be found at

www.marshall.edu/assessment/GenEdAssessment.aspx.

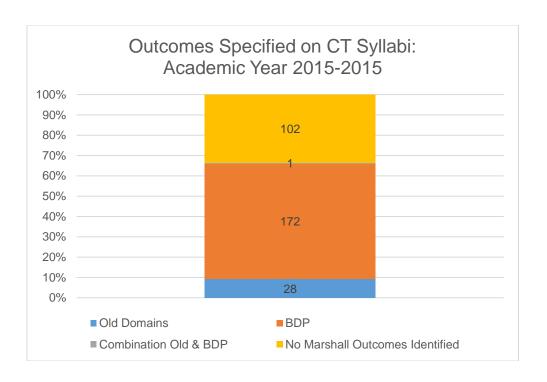
- Core II: Written Communication Assessment: The results for spring 2014, AY 2014-15, and AY 2015-16 appear in #Appendix XXIII. In AY 2015-16 the program conducted an assessment of ENG 201 based on Marshall University's Baccalaureate Degree Profile outcome, Communication Fluency, to which the program added one unique outcome (research). Results show that between 18 and 51% of students scored below the introductory level (18% for diction, 29% for communication style, 40% for organization, and 42% for research).
- Library Assessment: iSkills results, reported in 2013, compared results from a sample of 230 students from Marshall with a reference group of 2,079 students for the Core Report, and 70 students from Marshall with a reference group of 1,184 students for the Advanced Report. Results were reported in seven skill areas for both reports. These were *Define, Access, Evaluate, Manage, Integrate, Create,* and Communicate. Overall, Marshall's student performance compared favorably to the performance of the reference group.

During academic year 2014-2015, Marshall's Library launched a new online information literacy assessment. Like iSkills, it is composed of a *basic* assessment (for freshmen and sophomores) and a *capstone*

assessment (for juniors and seniors). Please refer to <u>#Appendix_XXIV</u> for the results of this assessment.

Indirect Assessment:

Course Syllabus Approval and Evaluation (Curricular): Marshall's CT courses, approved by the University's General Education Council, are asked to include outcomes that align to Marshall's Integrative Thinking Baccalaureate Degree Profile (BDP) outcome and to at least an additional four chosen from among Marshall's remaining eight BDP outcomes (Communication Fluency, Creative Thinking, Ethical and Civic Thinking, Information Literacy, Inquiry-Based Thinking, Intercultural Thinking, Metacognitive Thinking, and Quantitative Thinking). The rationale for asking CT courses to include *Integrative* Thinking as one of their outcomes is that one of the purposes of CT courses is to extend the introduction students receive in FYS concerning the integration of ideas and skills across disciplines and domains of thinking. The Assessment Office conducted an analysis of syllabi for CT courses offered at Marshall during academic year 2015-2016. A total of 355 CT course sections were offered during this year, with a total of 303 syllabi (85%) uploaded to MUBert. Of the 355 course sections offered, 244 (69%) were offered on the Huntington campus, 63 (18%) were offered online, and 48 (13%) were offered at locations other than Huntington. The College of Liberal Arts offered 245 (69%) sections, the College of Science 76 (21%) sections, and all other colleges combined (Arts and Media, Business, Education and Professional Development, Health Professions, and Information Technology and Engineering) 34 (10%) sections. Of the 303 syllabi uploaded to MUBert, we found that 173 (57%) included outcomes that aligned to outcomes of Marshall's current BDP (although one of these syllabi also included language from some old domains of thinking), while 28 (9%) syllabi continued to include outcomes that aligned to Marshall's old Domains of Thinking. Of concern was that 102 (34%) of the uploaded syllabi included NO mention of any outcome that aligned to one of Marshall University's outcomes from the BDP or the old Domains of Thinking.



Only 150 (49.5%) of the 303 CT syllabi identified *Integrative Thinking* as an outcome of the course. We note that all CT course syllabi from the Colleges of Arts and Media, Education and Professional Development, and Information Technology and Engineering included *Integrative Thinking*. It was included least often on syllabi from the College of Health Professions (one out of six [17%]). Numbers for other colleges include College of Science (18 out of 67 [27%]), College of Liberal Arts (112 out of 207 [54%]), and Lewis College of Business (13 out of 17 [76%]).

Regarding the requirement for outcomes to align to at least <u>four BDP</u> outcomes (in addition to *Integrative Thinking*), 136 (45%) of the 303 uploaded syllabi included *Integrative Thinking* and at least four additional BDP outcomes.

The other eight BDP outcomes were identified in CT syllabi with the

following frequencies:

BDP Outcome	Current Language	Old Language	Total	Percent of 303 Uploaded Syllabi
Communication Fluency	82	16	98	21%
Creative Thinking	45	9	54	18%
Ethical and Civic Thinking	68	12	80	26%
Information Literacy	86	11	97	32%
Inquiry-Based Thinking	140	2	142	47%

Intercultural Thinking	115	10	125	41%
Metacognitive Thinking	76	4	80	26%
Quantitative Thinking	67	11	78	26%

Allowing for a small percentage of outcomes that continue to use the language of the old Domains of Thinking, the BDP outcomes most often specified in CT syllabi are *Integrative Thinking* (49.5%), *Inquiry-Based Thinking* (47%), *Intercultural Thinking* (41%), *Information Literacy* (32%), *Ethical and Civic Thinking, Metacognitive Thinking*, and *Quantitative Thinking* (26% each), *Communication Fluency* (21%), and *Creative Thinking* (18%).

National Survey of Student Engagement (NSSE: Curricular and Co-Curricular): As discussed previously, Marshall noted from 2008 NSSE data that Marshall's students scored significantly lower than did those at its Carnegie peer institutions in the area of Active and Collaborative Learning. Following implementation of Marshall's new Core Curriculum in academic year 2010-2011, Marshall's freshman NSSE scores in Academic and Collaborative Learning and in Level of Academic Challenge improved significantly, with Marshall's score being commensurate with the score of the top 50% of NSSE institutions in 2011 and 2012 for the area of Level of Academic Challenge. The past three years of results from the revised NSSE survey have continued to show that Marshall's freshmen score competitively with freshman from the top scoring 50% and 10% of NSSE institutions in the new theme of Academic Challenge. The table below shows the *Engagement Indicators* in which Marshall's freshman students' responses were at least commensurate with those of freshmen in the top 50% or the top 10% of NSSE institutions.

Theme	Engagement Indicator	Top 50%			Top 10%		
		2013	2014	2015	2013	2014	2015
Academic Challenge	Higher-Order Learning	Х		Х			
	Reflective and Integrative Learning	Х		Х	Х		
	Learning Strategies	Х	Х	Х			
	Quantitative Reasoning	Х	Х	Х	Х	Х	Х
Experiences	Student-Faculty					I	
with Faculty	interaction						
	Effective Teaching Practices			Х			

NSSE survey results from 2013 to 2015 also show that our freshmen report participating in **learning communities** and engaging in **service** learning at levels that are significantly lower than freshmen from our Carnegie Peer Institutions. Finally, we have analyzed combined survey data from 2009 – 2012, completing a within-Marshall comparison based on first generation status. Approximately 48% of Marshall's freshmen reported that they did not participate in cocurricular activities and this percentage was higher (56%) for first generation than for non-first generation (40%) freshmen. Refer to #Appendix_XXV for this report. Finally, mapping *NSSE* items to areas of learning in the Lumina Foundation's Degree Qualifications Profile showed that Marshall continued (in 2012) to have a relative area of weakness in the extent to which student experiences align to *civic* learning. Refer to #Appendix XXVI for this report and to www.marshall.edu/assessment/SurveyReports.aspx for all NSSE reports.

Degree Program [and Core Curriculum] Surveys (Curricular): The Degree Program [and Core Curriculum] surveys were short surveys sent to all undergraduate students enrolled at Marshall in the springs of 2014 and 2016, respectively. A total of 916 undergraduate students (133 freshmen, 155 sophomores, 201 juniors, and 427 seniors) enrolled in 95 separate degree programs at least partially completed the 2014 survey. Results of the 2014 survey provided students' perceptions of their attainment of the university's outcomes through general education and degree program courses, while results of the 2016 survey provided only students' perceptions of their progress toward the university's outcomes through general education courses. For the university's undergraduate students as a whole, results showed that items aligned to the following Marshall Core Domains had means of 4.0 or higher (with "5" being the highest possible rating) when students rated the items according to knowledge and skills from their *core curriculum* courses for either the 2014 or 2016 survey administrations (or for both):

Survey Items with Means > 4.0 (on a five-point Likert Scale)

Survey Item	Learning Outcome	Means ≥ 4.0 or higher in 2014	Means ≥ 4.0 or higher in 2016
Use knowledge from more than one area of study to explore issues or to solve problems.	Integrative Thinking	4.15 (<i>n</i> = 906)	4.11 (<i>n</i> = 794)
Assess my own	Ethical/Civic Thinking	4.12 (<i>n</i> = 911)	4.09 (<i>n</i> = 798)
values and examine other viewpoints and credible evidence.	Inquiry-Based Thinking		
Determine how to improve my own learning.	Metacognitive Thinking	4.07 (<i>n</i> = 910)	3.99 (<i>n</i> = 798)

Examine issues from multiple perspectives	Creative Thinking Ethical/Civic Thinking	4.05 (<i>n</i> = 907)	4.05 (<i>n</i> = 797)
Find scholarly information, evaluate it critically and use it effectively.	Information Literacy	4.03 (<i>n</i> = 912)	4.08 (n = 793)

Survey Items with Means < 4.0 (on a five-point Likert Scale)

Survey Item	Learning Outcome	Means < 4.0 or higher in 2014	Means < 4.0 or higher in 2016
Develop the ability to write effectively.	Communication Fluency	3.96 (<i>n</i> = 914)	3.96 (<i>n</i> = 794)
Use what I know to solve novel problems.	Creative Thinking	3.93 (n = 897)	3.84 (n = 789)
Develop the ability to express myself effectively through speaking.	Communication Fluency	3.92 (<i>n</i> = 900)	3.83 (n = 784)
Analyze and evaluate issues and solve real-world problems in a manner that is ethical and supportive of our civic well-being.	Creative Thinking Ethical and Civic Thinking Inquiry-Based Thinking	3.90 (n = 902)	3.85 (n = 790)
Develop multicultural and global perspectives.	Intercultural Thinking	3.81 (<i>n</i> = 891)	3.76 (n = 787)
Develop my ability to use mathematics in everyday life.	Quantitative Thinking	3.53 (n = 873)	3.62 (n = 785)

Please refer to www.marshall.edu/assessment/SurveyReports.aspx for a complete analysis. There were 343 responses to the survey item, "Please provide examples of practices in your Core Curriculum (general education) courses that have resulted in deep learning." Forty (12%) of the responses mentioned having had a learning experience within FYS that resulted in deep learning. Core II courses, especially English, were often mentioned as well. Of note is that learning activities described typically required students to engage in active and reflective learning. Please refer to #Appendix xxvIII for a Wordle showing most frequently used words in student responses.

■ Graduation Survey (Curricular): In interpreting these results, we must keep in mind that only graduating seniors complete this survey and they do not differentiate between *core curriculum* courses and *degree program* courses when doing so. Also, we have used a reversed scale for the Likert items on this survey, with 1 = Strongly Agree and 5 = Strongly Disagree. So, means of 1 and 2 equal means of 5 and 4 on the Degree Profile and Core Curriculum surveys from the previous bullet. Additionally, we initially analyzed survey results based on calendar years (2010, 2011) and then switched to academic years (summer, fall, spring) in 2012. So we have results for calendar years

2010 and 2011, for the spring semester of 2012, and then for academic years 2012-2013, 2013-2014, and 2014-2015. Response rates during this period have ranged from a high of 42% for academic year 2012-2013 to a low of 28% in academic year 2013-2014. Average response rate across the period was 36% (3,276 responses out of 9,197 surveys sent). Finally, we significantly revised many of the Likert-Scale Items beginning with the spring 2012 survey to more nearly align with Marshall's Degree Profile and to try to make the items more objective. Over the review period, no item that aligns to the Marshall Degree Profile exceeded a mean score of 2.37, with means for most items falling between 1.0 and 1.99. The only items whose means exceeded 2.0 for the entire reporting period were items concerning the perceived efficacy of writing intensive courses and students' perceptions of their mathematical abilities. Detail for items that exceeded means of 2.0 are in the table below. You can review the entire report for academic year 2014-2015 in #Appendix XXVIII.

Survey Item **Degree Profile** Mean Alignment "I found writing intensive courses 2.37 (2010) Communication I took valuable" (2010 and 2011) Fluency 2.37 (2011) or "Writing intensive courses 2.18 (Spring 2012) helped me to improve my writing 2.17 (AY 2012-2013) skills" (2012-present) 2.23 (AY 2013-2014) 2.07 (AY 2014-2015) "I developed the ability to use Quantitative 2.25 (2010) mathematics effectively" (2010 **Thinking** 2.26 (2011) and 2011) or "I developed the 2.39 (Spring 2012) ability to use mathematics in 2.33 (2012-2013) everyday life" (2012-2014) or "I 2.34 (2013-2014) developed the ability to use 2.05 (2014-2015) mathematics to explore realworld problems" (2014-present)

Freshman Survey: In December 2015 the Office of Assessment sent a short survey to 2,060 freshmen, 928 of whom were enrolled in FYS during the fall semester 2015. Surveys were at least partially completed by 572 freshmen, 313 enrolled in FYS (55% of respondents) and 259 not enrolled in FYS (45% of respondents) during the fall semester. The survey consisted of 27 items, 25 of which aligned to one or more of Marshall's Degree Profile outcomes. Twelve of the items were taken (or adapted) from NSSE and the rest were developed by Marshall faculty and staff. Independent samples *t-tests* showed that freshmen enrolled in FYS during fall 2015 had significantly higher means than did students not enrolled in FYS on six of the 27 items. Two of these items aligned to Marshall's *Intercultural Thinking* outcome, two to Communication Fluency, one to Information Literacy and one to Integrative Thinking and Ethical and Civic Thinking. Further analysis using *Chi-Square* resulted in significance for the two items that aligned to Communication Fluency and to additional items; one

aligning to *Integrative Thinking*, one to *Creative Thinking* and *Integrative Thinking*, and one to *Information Literacy* and *Inquiry-Based Thinking*. Additionally, FYS means were higher than non-FYS means for all items except two, and for these items the FYS means were 2.93/3.14 as compared to the non-FYS means of 2.96/3.14.

Although results must be interpreted with caution, they suggest that, during the semester students were enrolled in FYS, they reported that they had often or very often engaged in activities that aligned to the following Marshal outcomes: *Creative Thinking*, *Ethical and Civic Thinking*, *Intercultural Thinking* (specific FYS outcome), *Integrative Thinking* (specific FYS outcome), *Information Literacy* (specific FYS outcome), and *Communication Fluency*. We suggest that the differences seen with *Communication Fluency* are a testament to the emphasis on active learning in the course (made class presentations) and the use of multiple written assignments as a method of learning (completed writing assignments). Please refer to #Appendix XXIX for an executive summary of the 2015 Freshman Survey Results as they related to FYS.

Assessment Day Focus Groups: Focus Groups were conducted on Assessment Day in 2011 and 2013 that addressed the question, "What makes a good classroom learning experience?" Major themes included the importance of active learning and critical thinking, a caring and enthusiastic instructor, effective use of feedback regarding student performance (i.e. assessment), and connections. Please refer to #Appendix XXX for both Focus Group reports. Additional information regarding past Assessment Day results can be found at www.marshall.edu/assessment/AssessmentDay/Default.aspx.

Summary of Assessment Results:

• Direct evidence from baseline/FYS assessments shows that our students made significant gains in some aspects of critical thinking and information literacy during FYS (with notable improvements in some areas during academic year 2015-2016) and in all aspects of these outcomes and in written communication between freshman and senior year. Although interpretation of results for CLA/CLA+ and baseline/senior assessments is complicated due to the fact that, over the review period, many seniors received general education through the Marshall Plan rather than the Core Curriculum, baseline/FYS comparisons include only students who entered Marshall under the Core Curriculum. Furthermore, these comparisons are pre-posttest in nature, using each student as his or her own control.

Direct evidence from assessing authentic student work completed in writing intensive courses showed that student writing improved between 100-200 and 300-400 level courses and between freshman/sophomore and junior/senior class rank, with final results (on average) approaching Marshall's expected benchmark of 3. Direct evidence from assessing authentic student work from multicultural and international classes showed that, on average, students approached level 2 for most traits of *Intercultural Thinking*, which is below the expected benchmark of 3. Although most of the artifacts assessed were from 100-200 level courses, there was no evidence of greater proficiency from students enrolled in higher-level courses. The same held true for student work from service learning courses, assessed using the rubric for *Ethical and Civic Thinking*.

Assessment results showed that student performance approached the expected benchmark of "3" (ranging from 1.98 [citation] to 2.45 [relevance of information] in some aspects of *Information Literacy*. However, overall mean performance was just under "2" for both traits of *Metacognitive Thinking* and ranged from 1.44 (relations among domains of thinking) to 1.96 (connections among disciplines) for *Integrative Thinking*. To date, we have not assessed a sufficient number of artifacts that align to the other two Marshall outcomes (*Quantitative* and *Creative Thinking*) to draw conclusions.

Results from direct assessments of student work from course-based assignments lead us to conclude that, overall, students are achieving our expected levels of performance in *Communication Fluency and* in some aspects of *Information Literacy*. However, evidence suggests that students are not at the level we would like to see in *Integrative Thinking*, *Ethical and Civic Thinking*, *Intercultural Thinking*, and in *Metacognitive Thinking*. At this time, assessment of work products from course-based assignments do not provide enough information to evaluate performance on *Creative Thinking*, *Quantitative Thinking*, or *Inquiry-Based Thinking*. However, evidence from baseline/FYS specific assessments suggests that, at the freshman level, students show gains in *Inquiry-Based Thinking*.

We note, too, that the Department of Communication Studies, which coordinates the assessment of student achievement in the Core II Oral Communications courses, has developed an effective model, not only of valid direct assessments, but of *communicating* these results to faculty and teaching assistants delivering this instruction. This communication has led to changes in course delivery that significantly improved student outcomes within a short period of time. We speculate that the organization of the multiple sections of this course, which use a common syllabus and report to the CMM 103 coordinator, is a successful and efficient model for delivery of multiple sections of

the same Core II course. We also are excited about the changes the English Department will soon pilot with written communication assessment in its gateway composition course, ENG 201. Multiple readers assessing multiple writing samples and reflections should provide a robust assessment of early student writing that will help to inform changes needed to positively impact student outcomes. Finally, we applaud the work that the faculty in University Libraries completed to launch a sophisticated Information Literacy assessment through the Blackboard Learning Management System. Items were carefully constructed to allow assessment of student mastery of essential elements of Information Literacy at early and later stages of the college experience.

• Indirect evidence from analysis of CT course syllabi suggests that work must continue to ensure that CT courses are, in fact, addressing the outcomes of Marshall University's Baccalaureate Degree Profile (BDP). Additionally, academic departments must ensure that each section of a course approved by the General Education Council (GEC) for CT credit address the outcomes articulated in the proposal that the GEC approved. According to current guidelines, these outcomes should include Integrative Thinking and at least four additional BDP outcomes. Our analysis of CT syllabi from academic year 2015-2016 indicated that only 50% of CT syllabi include Integrative Thinking as an outcome and only 45% of CT syllabi include an additional four BDP outcomes! The integrity of course instruction is necessary to ensure that our students achieve the outcomes of the BDP.

Indirect evidence from *NSSE* shows that, following implementation of the Core Curriculum, Marshall's freshmen have consistently indicated a greater level of *academic challenge* than had previous classes. However, a longitudinal *NSSE* analysis indicated that first-generation students engage in fewer co-curricular activities than do non-first-generation college students. Furthermore, mapping *NSSE* results to those of the Lumina Foundation's Degree Qualifications Profile in 2012 indicated that Marshall's students need more opportunities for *Civic Engagement*.

Indirect evidence from Marshall's graduation surveys shows that, overall, students are satisfied with their Marshall educations and, through their responses to Likert Scale items that align with Marshall's outcomes, feel that they have received an education that has allowed them to achieve these outcomes. Interestingly, their relatively lower scores on the item that aligns to *Quantitative Thinking* does not comport with *NSSE* results, which shows *Quantitative Reasoning* to be a strength for our students (at least as compared to students at other *NSSE*'s top scoring institutions across the country).

Finally, indirect evidence from the Freshman Survey, given in fall 2015, suggests that freshman enrolled in FYS are engaging in more learning activities aligned with the BDP outcomes introduced during FYS and with some additional BDP outcomes as well. Of note is that indication that students enrolled in FYS engage in more active learning (e.g. presentations and writing) than do students not enrolled in FYS.

Issues (and solutions) identified from analysis of assessment results

• Authentic Student Work: Although we are collecting authentic student work for assessment purposes, there is evidence that not all instructors are creating assignments that align to the university's outcomes (refer to reports in #Appendix XX and #Appendix XXI for analysis of misaligned assignments). We recommend further conversations regarding the university's outcomes, with committees consisting of faculty who teach courses that align to specific outcomes providing recommendations regarding any revisions to performance indicators for each outcome.

We further recommend that rubrics be revised to extend essential elements into outcome statements (aka as "performance indicators") with five performance levels (ranging from level "0" to level "4", with level "3" being the benchmark for baccalaureate graduating performance) for each performance indicator and that these performance levels be continuous, rather than categorical, in nature. We believe that this step will help to address the issue of students not attaining the benchmarks for some of the University's outcomes. We note that, in the past, performance levels on our assessment "rubrics" have been categorical, i.e. have essentially been different outcomes graded using lower-level to higher-level verbs from Bloom's Taxonomy. While there is an argument to be made for this approach to instruction, the Summer Assessment Workgroup has found that many instructors of 100- and 200-level courses have designed assignments that aligned to the lowest levels of the previous assessment rubrics (outcome statements using verbs at low levels of Bloom's Taxonomy), thus not allowing students to demonstrate higher levels of performance. We believe that students should be provided with opportunities to demonstrate work that aligns to the outcomes of the BDP, even if their early work products are not as sophisticated as work products they produce near the time of graduation. Regarding the redesign of the assessment rubrics, the 2016 Summer Assessment Workgroup made changes to the rubrics for *Information Literacy*, *Metacognitive Thinking*, and Integrative Thinking. We suggest that, with the input of faculty teaching the courses regarding performance indicators for each outcome, the task of specifying the performance levels be left to faculty who comprise the Summer Assessment Workgroup.

We also recommend that all faculty teaching courses approved by the General Education Council (CT, MC, and INT) attend a faculty development session aimed at creating summative assignments to address the appropriate university outcomes before teaching these courses.

- cT Syllabi: Although significant improvements have been made in CT syllabi since our initial review in 2013, the fact that only 50% of CT syllabi reviewed during academic year 2015-2016 indicated that the course addressed *Integrative Thinking* and that only 45% of reviewed syllabi indicated that the course addressed *Integrative Thinking* plus four additional BDP outcomes, is unacceptable. We recommend that College Deans work with Department Chairs to ensure that faculty who teach CT courses complete faculty development through the Center for Teaching and Learning before teaching these courses. We also strongly recommend that efforts be made to ensure that each section of the same course address the same BDP outcomes.
- Outcomes of Core II Courses: At present, outcomes of Core II courses are being assessed in a systematic fashion for only Oral Communication and Composition. We recommend conversations with academic units responsible for delivery of Core II courses in the Fine Arts, Humanities, Social Sciences, Physical and Natural Sciences, and Mathematics to develop plans for assessment of student performance in these courses that will result in actionable results. These assessments could be accomplished centrally through artifact submission to the Blackboard Assignment Module (which will replace GEAR in academic year 2016-2017). If this route is chosen, these artifacts could be added to the work completed each summer by the Summer Assessment Workgroup. However, the task also could be accomplished by aligning exam questions to BDP outcomes using a new tool in Blackboard (as has been already accomplished by University Libraries) or by a plan developed and administered by the respective academic units. We recommend conversations with each Dean and academic unit faculty regarding plans to accomplish these assessments.
- National Survey of Student Engagement (NSSE): The NSSE has provided robust information to help us track the changes in student perception of their learning and Marshall experiences before and after the introduction of the Core Curriculum. Perhaps the most important finding after implementation of the Core Curriculum was improvement in first-year students' perception of the "Level of Academic Challenge" at Marshall. However, we continued to note that first-year students reported engaging in learning communities and in service learning at lower levels than did freshmen at our Carnegie Peer Institutions. Since research by Finley and McNair (2013) and others suggests that participation in learning communities and in service learning have significantly positive effects on

deep learning among students, we developed a pilot project, launched in academic year 2014-2015, to design learning communities through courses linked by a common theme. Four pairs of linked courses (with one course in each pair an FYS section) were launched in fall 2015 and three course pairs are currently underway.

Additional Issues (and solutions) identified

- General Education Council records regarding dates of initial approval of CT, MC and INT courses are spotty. We recommend that the Office of Academic Affairs identify an individual responsible for recording and maintaining dates of final approval of these courses, for notifying the General Education Council and appropriate academic departments when five-year re-approvals are due, and for recording the dates of those reapprovals.
- The Office of Institutional Research provided first year retention (fall to fall) data for first-time freshmen entering Marshall from 2005-2009 (the five years preceding implementation of the core curriculum) and those data for 2010-2014 (the first five years following implementation of the core curriculum). After a drop in 2006, retention remained fairly steady until the class entering Marshall in fall 2013 (the fourth year of the core curriculum) when retention began to trend upward and this trend has continued since that time. Likewise, there has been a slight improvement in 4-year graduation rates for classes entering Marshall since the implementation of the core curriculum. However, a number of initiatives including implementation of four-year plans of study and course rotation plans in fall 2010, launch of Degree Works and the Student Success Collaborative in fall 2012, launch of Summer Bridge programs for students needing developmental English and/or Mathematics in summer 2012, launch of Student Resource Center and Week of Welcome in fall 2010, in addition to implementation of the core curriculum in fall 2010 could all, in some combinations, have had an impact on improved retention and four-year graduation rates.

Likewise, we must continue to be cognizant of the fact that fully admitted high performing students (those with high school GPA \geq 3.25) persist and graduate at a much higher rate than either fully admitted low performing students (those with high school GPA < 3.25 who have ACT/SAT scores high enough for full admission) or conditionally admitted students. Interestingly, overall the persistence and graduation rates of fully admitted students with low high school GPAs is only slightly higher than those rates for conditionally admitted students. In fall 2015, the Office of Academic Affairs initiated an experimental mentoring program for fully admitted low performing first-time freshmen to determine whether the program would be able to assist students in improving GPA, general wellness/satisfaction/integration, and persistence from year to year. The

program is called MU EDGE (Explore, Design, Graduate, and Empower). Selected faculty have been trained to serve as EDGE mentors and each mentor meets with approximately 30-35 EDGE mentees four times per semester for their first two years of college.

- III. Questions Posed and Recommendations for Improvement (adapted from General Education Maps and Markers: Designing Meaningful Pathways to Student Achievement (2015))
 - 1. Describe how the Core Curriculum is (or is not) allowing students to demonstrate *proficiency*, i.e. to achieve university outcomes at a desired level and to have *significant learning* experiences at Marshall. What improvements, if any, need to be made to achieve this goal?
 - The answer to this question regarding achieving student learning outcomes was addressed in the sections on assessment of student learning. Based on the results of direct assessment reported earlier in this report. Marshall's students demonstrate (on average) achievement approaching level 2 on our assessment rubrics for four of our nine outcomes (Intercultural Thinking, Integrative Thinking, Metacognitive Thinking, and Ethical and Civic Thinking). This is an acceptable level of performance at the end of the sophomore year. However, in some cases work was sampled from 300/400 level courses without a significant difference in student performance. For Communication Fluency and for some traits of *Information Literacy*, average student performance approached level 3, which we expect of our graduating students. Evidence from the CLA+ shows that Marshall's "value-added" (difference between freshman and senior performance) is at the expected level and that, on average, our seniors perform at a "proficient" level, whereas on average our incoming freshmen perform at a "basic" level. This assessment addresses critical thinking (which includes problem solving, analytic reasoning, and information literacy) and written communication. Mean scores of Marshall's seniors on our senior assessment (which assesses the same outcomes as the CLA+) have consistently approached level 3. Additionally, we have consistently seen significant improvement on these outcomes between matriculation and the end of FYS.

Indirect evidence from *NSSE*, from the Core Curriculum Survey, and from graduation surveys shows that, since the implementation of the core curriculum, freshmen have rated Marshall's "level of academic challenge" higher than they did before implementation of the Core. Finally, results of a freshman survey given in fall 2015 showed that freshmen enrolled in FYS rated items aligning to Marshall University's BDP outcomes than did freshmen not enrolled in FYS.

 While data show we have made progress in improving student learning since implementation of the Core Curriculum, there continues to be room for improvement. Some of these improvements, namely improving alignments between signature assignments within Core Curriculum courses to BDP outcomes, ensuring that courses approved for CT credit address the appropriate BDP outcomes, and expanding assessment of student learning to Core II courses in a systematic way, were addressed in the previous section. We also need to work with degree programs to align student capstone work to Marshall's BDP outcomes. Assessment of senior capstone work has the potential to provide the strongest evidence of student attainment of the BDP outcomes at the time of graduation.

- 2. Describe to what extent the Core Curriculum allows students to demonstrate *agency* and *self-direction*, i.e. to create an educational plan and to identify high quality work for a portfolio. What improvements, if any, need to be made to achieve this goal?
 - Students at Marshall University have limited ability to create their own educational plans, which are dictated by prescribed four-year plans of study. That said, each plan has room for elective choices, which students choose in consultation with their academic advisors.
 - At the present time, all students enrolled in Core I (FYS and CT) courses, as well as those enrolled in courses carrying MC, INT, WI, and SL designations upload authentic classroom work to the General Education Assessment Repository (GEAR). Please note that these uploads will be accomplished through the Blackboard Assignment Tool beginning in academic year 2016-2017. However, these uploads do not create a student portfolio and, most often, students upload the work designated by their course instructors. New enhancements to the University's Blackboard Course Management System allow the creation of electronic portfolios, making it possible for each student to create one. Additionally, some degree programs (e.g. Journalism and Mass Communications) require that each student submit a portfolio of their work for faculty assessment prior to graduation. We believe that the best way to accomplish assessment through electronic portfolios is to work with degree program faculty to implement electronic portfolios within majors.
- 3. Describe to what extent the Core Curriculum allows students to actively participate in *integrative learning* and *problem-based curricular*, cocurricular, and community-based work (local, global, and virtual)? What improvements, if any, need to be made to achieve this goal?
 - Each student is introduced to, and gains experience with, integrative learning and problem-based curricular work during his or her FYS experience. FYS, which is overseen by a Coordinator of FYS and requires faculty development before teaching the course, emphasizes these outcomes for students. Additionally, the FYS final exam requires students to grapple with a real-world problem that potentially has more than one solution, to evaluate documents that contain evidence that may (or may not) help them develop a solution to the problem, and make a final recommendation justified by evidence, taking into consideration possible consequences of their decision.

- Although not as many students as we would like complete Service Learning during their freshman year, by senior year the percentage of students who have participated in these courses is much higher. The Director of Service Learning and other personnel from the Center for Teaching and Learning work with course instructors and community and university partners to design significant learning experiences for students through community-based work.
- We recommend that improvements to this area involve more collaborative work between Academic Affairs, Student Affairs, and Housing and Residence Life. Collaboration with the latter two units is important as we strive to improve the co-curricular and community-based aspects of our students' learning experiences. In these collaborations, we recommend that care be taken to align the outcomes of these experiences to BDP outcomes. Additionally, given that NSSE results indicate that our first-generation students are less likely than non-first-generation students to participate in co-curricular activities, we recommend that a strategy be developed to involve these students.
- 4. Describe how the University ensures that ALL students are included in the Core Curriculum (equity). What improvements, if any, need to be made to achieve this goal?
 - All students who enroll at Marshall as first-time freshmen are required to complete the Core Curriculum. However, students who transfer to Marshall with 30 or more college credits must complete only <u>one</u> CT course. Although they must complete all Core II and additional requirements, all except WI credit can be fulfilled through transfer courses.
 - Since, by definition, students who complete the Regents' Bachelor of Arts (RBA) program do not have a specific major, they are not required to complete a capstone experience.
 - We do not believe that improvements are needed with regard to equity.
- 5. Describe the process (if it exists) for students to produce *signature* assignments that are evaluated. Describe how assessment results are shared with the university and used for improvement of student learning (*transparency* and *assessment*). What improvements, if any, need to be made to achieve this goal?
 - The primary signature assignment for which students produce artifacts is the assignment created for the capstone experience in each major. A perusal of #Appendix XII shows that capstone experiences, and hence signature work from these experiences, vary widely throughout the university. In most degree programs capstone projects are evaluated by students' capstone instructors; however some programs have juried evaluations of capstone experiences. In other words, these projects and/or performances are evaluated by multiple faculty within the student's discipline. In some cases, outside professionals may participate in the evaluation.
 - Each degree program submits an assessment report annually to the Office of Assessment. The reports include an assessment of student performance on

each of the program's learning outcomes at two assessment points; one early in the student's program of study and one at the time of graduation. The final assessment is conducted often, although not always, using the student's capstone project. All assessment reports are evaluated by one reader from the University Assessment Committee and by the Associate VP for Assessment and Quality Initiatives using a rubric developed for that purpose. Rubric scores and feedback from both reviewers are shared with degree programs in an effort to foster continuous improvement in the assessment process. University assessment reports, including a report of all assessment activities conducted at Marshall, are shared each year with the University Assessment Committee. University Assessment Committee members are asked to share these reports with faculty and staff in their colleges/units. All university assessment reports, degree program assessment plans, survey reports, and five-year program reviews are also posted to the Assessment website.

- Despite the efforts mentioned in the previous bullet, we know that results of
 university assessments are not reaching a large number of faculty and staff
 within the university. Suggested improvements include initiation of a semiannual assessment newsletter that would include highlights of assessment
 results with links to additional information and supporting documentation, and
 periodic presentation of assessment results to the University's Faculty
 Senate.
- 6. Considering the answers to the questions above <u>and</u> all other information in the review, make additional recommendations for the Core Curriculum.
 - Returning to the theme of *signature* assignments, it would be ideal if Marshall's freshmen, as outlined in General Education Maps and Markers: Designing Meaningful Pathways to Student Achievement (2015), developed plans with their academic advisors to complete signature assignments during their first two years at Marshall. We propose that two signature assignment types be piloted: Service Learning projects with guided reflections, Research or Creative projects with resulting papers and/or presentations. We recommend that these projects be initiated in FYS (or other designated freshman course) and continued through at least one subsequent CT, Core II, or major courses taken during the first two years. We realize that this plan will present some challenges; that is the reason we recommend initial implementation of a pilot project. The pilot would link selected FYS classes and companion CT, Core II, or major-specific courses. Additionally, the Center for Teaching and Learning (CTL), through its Service Learning Director, could help to arrange linked courses with Service Learning components, and the FYS coordinator and the CTL could work with faculty in academic departments interested in partnering with FYS (or other courses) to embed a two (or more) semester long research or creative project. This plan has the potential to help students see the linkages among Marshall's outcomes used to accomplish significant work.

- We further recommend moving in the direction of asking that students create electronic portfolios of their signature work (minimally their sophomore and senior [capstone] work products). Students now have the ability to create electronic portfolios within Marshall's Blackboard Course Management System at no cost to them and because students would be required to choose those work products (including signature assignments) that best demonstrate their mastery of the BDP outcomes, they likely would reflect on linkages between the work products they produce and the BDP outcomes. Additionally, students would have the ability to download the electronic portfolios they create within Blackboard and use these portfolios as evidence of their skills when seeking employment or admission to graduate or professional study. Work from portfolios could be randomly drawn for campus-wide assessment of student mastery of the BDP outcomes.
- In some degree programs, students are unable to fulfill all requirements of the Core Curriculum until their senior year at Marshall. This defeats the purpose and spirit of the Core Curriculum, which is to set the general foundation upon which more specialized course work will be built. We recommend that efforts be made to reach accommodations with programs that necessitate delaying Core Curriculum work until the end of a student's undergraduate career.

IV. Summary of Final Recommendations (based on Assessment Results and Questions Posed)

- Further scrutiny of BDP outcomes using feedback from faculty teaching core courses and further refinement of assessment rubrics (already begun). Responsible units are Assessment Office, University Assessment Committee, and Summer Assessment Workgroup.
- Further work with faculty to align assignments to BDP outcomes.
 Responsible units are Assessment Office and Center for Teaching and
 Learning.
- Further work with deans, chairs, and faculty on CT course alignments.
 Responsible units are Assessment Office and Center for Teaching and Learning
- 4. Work with appropriate deans and chairs to develop a workable assessment plan for Core II courses. Responsible unit is Assessment Office.
- Continued analysis of results of High Impact Practice (HIP) Learning Community and EDGE projects. Responsible units are HIP Project Steering Committee and HLC Persistence Academy Steering Committee.

- Appointment of an individual to be responsible for maintaining dates CT, MC, and INT courses are approved by the General Education Council and date for five-year re-approvals. Responsible unit is the Office of Academic Affairs.
- Implementation of a semi-annual assessment newsletter and annual assessment reports to the Faculty Senate. Responsible unit is the Assessment Office.
- 8. **Align student capstone work to BDP outcomes.** Responsible units are the Assessment Office, deans, chairs, and capstone instructors.
- 9. Identify core curriculum faculty and/or degree program faculty interested in participating in a pilot project to plan for students to develop signature work products that span more than one course. Possible themes for signature projects will be service learning, research or creative projects. Responsible units are the Office of Academic Affairs (Assessment and Teaching and Learning), the Office of Student Affairs, and Housing and Residence Life.
- 10. Identify degree programs interested in participating in a pilot project in which students select signature work products (that align to BDP outcomes) to be placed into an electronic portfolio. Responsible unit is the Office of Assessment.

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- General Education Maps and Markers: Designing Meaningful Pathways to Student Achievement. (2015). Washington, DC: American Association of Colleges and Universities, with support from Bill and Melinda Gates Foundation.
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Acknowledgments

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- **Dr. Robert B. Bookwalter**: Dean, College of Liberal Arts; Inaugural Chair of the General Education Council
- **Dr. Camilla Brammer**: Professor and Chair, Communication Studies; Faculty Representative to the Board of Governors; Member of the Core Foundations Ad-Hoc Committee; Current Member of the General Education Council; Member of the Summer Assessment Workgroup
- **Dr. Monica Garcia Brooks**: Associate Vice President for Online Learning and Libraries
- **Dr. Cheryl Brown**: Associate Dean, College of Liberal Arts; Chair of the Core Foundations Ad-Hoc Committee
- **Dr. Kimberly DeTardo-Bora**: Professor and Chair, Criminal Justice & Criminology; Member of the University Assessment Committee; Member of the Summer Assessment Workgroup
- **Dr. Robert Ellison**: Assistant Professor of English; Coordinator of Written Communication (Core II: Composition) Assessment; Member of the Summer Assessment Workgroup
- **Dr. Kristi Fondren**: Associate Professor, Sociology; Director of Marshall's Service Learning Program
- **Dr. April Fugett**: Professor, Psychology; Director of Marshall's Writing across the Curriculum Program
- Ms. Carol Hurula: Manager of Business Operations for the Office of Academic Affairs
- **Dr. Marty Laubach**: Professor and Chair, Sociology/Anthropology; Member of the General Education Council; Member of the University Assessment Committee; Member of the Summer Assessment Workgroup; Developed Statistical Model to predict GPA, probability of graduation and probability of withdrawal from Marshall
- **Dr. Nicola LoCascio**: Dean, Honors College; Current Chair of the General Education Council; Member of the University Assessment Committee
- **Dr. Karen McComas**: Executive Director, Marshall's Center for Teaching and Learning; Ex-Officio Member of the General Education Council; Member of the University Assessment Committee
- **Dr. Tim Melvin**: Assessment Coordinator, Marshall University; Member of the University Assessment Committee

- **Mr. Doug Nichols**: Online Web Developer, Office of Academic Affairs; Member of the University Assessment Committee
- Dr. Kelli Prejean: Associate Professor, English; Coordinator of Core II Composition
- **Dr. Mary Beth Reynolds**: Associate Vice President for Assessment and Quality Initiatives; Chair of the University's Assessment Committee; Ex-Officio Member of the General Education Council; Primary Writer for this Review
- **Mr. Larry Sheret**: Instruction and Emerging Technologies Librarian; Coordinator of the Marshall Library's Information Literacy Assessment; Member of the University Assessment Committee
- **Ms. Jennifer Sias**: Professor, Journalism and Mass Communications; Director of First Year Seminar; Member of the General Education Council
- Mr. Michael Smith: Assistant Director of Institutional Research and Planning
- **Dr. Sherri Smith**: Associate Vice President for Academic Affairs and Dean of Undergraduate Studies; Ex-Officio Member of the General Education Council; Ex-Officio Member of the University Assessment Committee
- **Dr. Jill Underhill**: Assistant Professor, Communication Studies; Coordinator of Core II Oral Communication Assessment

Appendices - Appendix I:

Selected Slides from: Kopp, S. J. (2006): *Educating for 21st Century Thinking and Learning: Teaching that Transforms the Intellect*, Accountability, Leadership and Organizational Development Challenges. Marshall University.

Educating For 21st Century Thinking and Learning

Teaching That Transforms The Intellect

Accountability, Leadership and Organizational
Development Challenges

Discussant:

Stephen J. Kopp, Ph.D.

President

Marshall University, Huntington, WV

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FOOD FOR THOUGHT

"The solutions to complex problems lie in the quality of thought [and clarity of purpose], not in the quantity of information and knowledge." 1

¹ Spies, P. (2000). University traditions and the challenge of global transformation. In S. Inayatullah and J. Gidley (eds.), The University in Transformation, Global Perspectives on the Futures of the University, p. 26. Westport: Bergin & Garvey

Some Key Strategic Questions

- What improvements in the caliber of thinking and knowing meaningfully distinguish the graduate from the student who began her/his program of study?
- How do the changes (advances?) in cognition (e.g., critical thinking, knowledge construction, ways of knowing, etc.) effected in each student through their educational experiences compare with the institution's professed outcomes?

Some Key Strategic Questions (continued)

- How do the intellectual capacities and attributes of students graduating in the 90th percentile compare with students graduating in the 10th percentile of the graduating class?
- What are the achievement gaps demonstrated by students in these or other graduating cohorts and are these margins acceptable?

Accountability for What?

- Professed institutional mission BEYOND ACCESS & "OPPORTUNITY" Actually advancing the caliber of thinking and learning
- Evidence of specified/professed learning outcomes/ thinking & performance gains
- Essential foundations, strategies and core competencies/proficiencies
- Evidence of advanced learning and thinking skills¹
 and dispositions

Objectives

- Produce greater value; value that is evident to public served
- Value manifest in the quality and caliber of intellectual work that can be performed by graduates
 - Creativity
 - Adaptability
 - ◆ Capacity to continue to learn
 - * Ability to think and problem solve
 - Marketability in an economy increasingly dominated by innovation & commerce of ideas.

Leadership Challenges

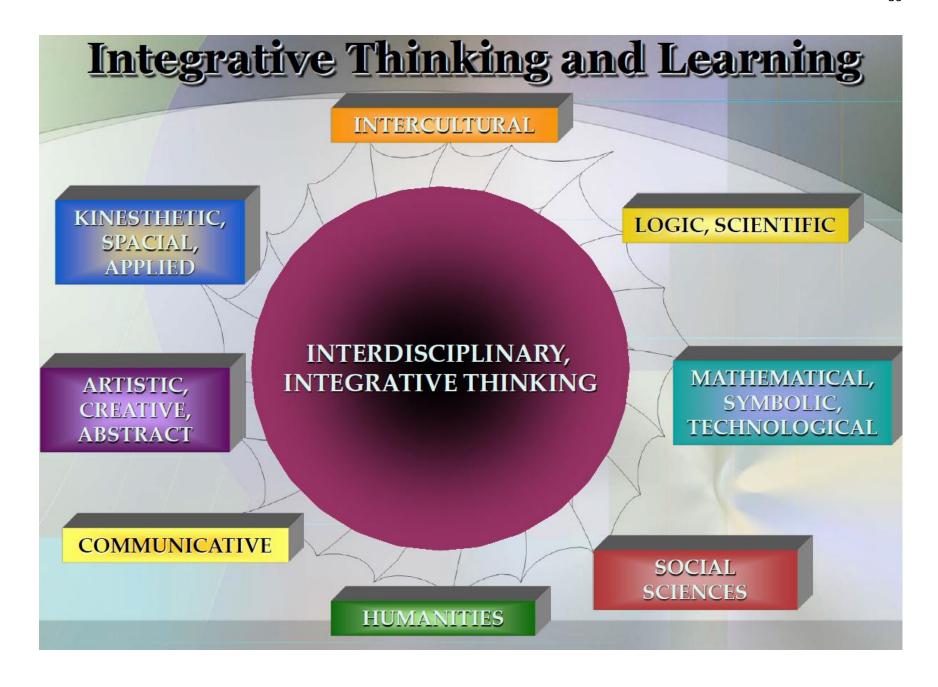
Creating conditions that foster:

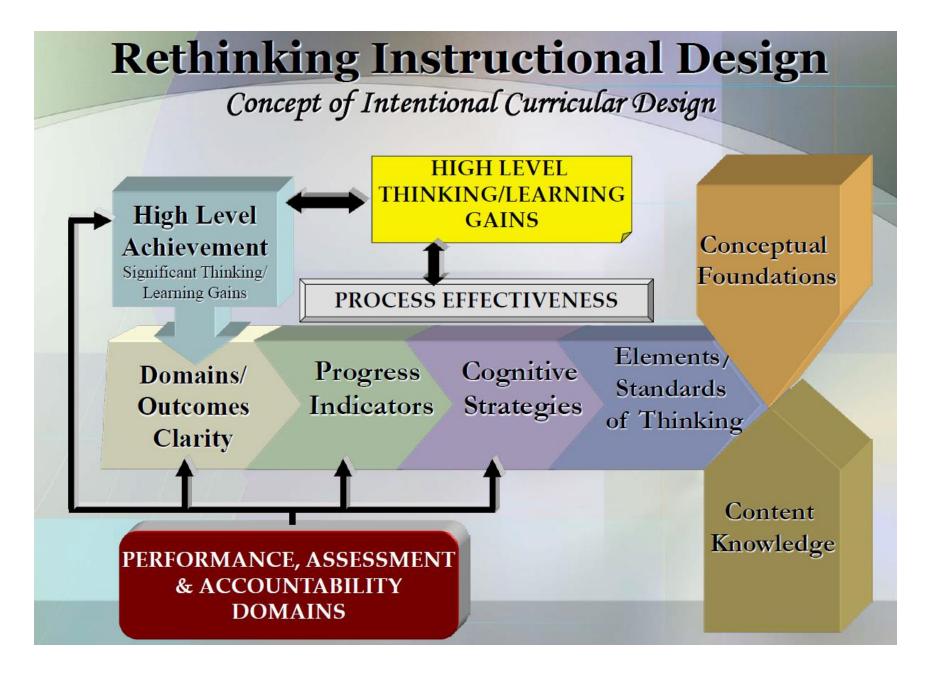
- Analysis of Assumptions & Evidence-Based Practices
 - Commitment to evidence-based effectiveness and improvement in learning gains based on reliable rubrics
- Experimentation/Innovation Risk-taking; well-designed experiments to increase learning/thinking productivity
- Ideas, Grassroots Initiatives & Peer Leadership –
 Empowering people to make a difference; redirecting time and effort to activities that make the >>> difference
- Accountability Institution-wide responsibility for improving student thinking and learning; professed outcomes are everyone's responsibility

What Do We Know?

Substantial and sustainable advances in thinking and learning result when instructional strategies are used that are:

- APPLIED involving students in thinking through the subject matter;
- ACTIVE requiring students to perform & practice important, consequential, and <u>meaningful intellectual work</u> (e.g., peer teaching, inquiry, problems, projects)
- MODELED demonstrating learning attitudes & dispositions; connecting to people (e.g., faculty)
- INTEGRATED structuring experiences that help them internalize thinking within and across disciplines





Closing Thought

What if we were to view critical thinking as a cipher, an operating system, for navigating the labyrinth of learning and educating students for the future, how would that perspective change/influence our thinking about our institutional practices?

Appendix II

Executive Summary of Marshall University's Collegiate Learning Assessment (CLA) Report for Academic Year 2006-2007. Please access http://www.marshall.edu/assessment/GenEdReports/0607CLA.pdf for the entire report.

I. Institutional Executive Summary

This 2006–2007 Collegiate Learning Assessment (CLA) Institutional Report for Marshall University provides information in several formats to assist you in conveying CLA results to a variety of campus constituents. As you know, the CLA assesses your institution's value added to your students' key higher order skills: critical thinking, analytic reasoning, problem solving, and written communication. These skills are intertwined, and the CLA measures them holistically. The CLA also allows you to do further research, measure the impact of changes in your curricula and teaching, and compare your school with our national sample of over 115 four-year institutions. Three questions of interest to many CLA schools are:

1. How did our students score after taking into account their incoming academic abilities?

We used our national database of four-year schools to examine whether your students performed (as a group) better or worse than what would be expected. Their "expected" CLA score is based on two factors, namely: (a) their mean SAT score and (b) the typical relationship between a school's average SAT score and its average CLA score. We designate five performance levels for an institution: well below expected, below expected, at expected, above expected, and well above expected. We report scores for freshmen and seniors separately and then combine them to estimate your institution's value added, which we divide into ten groups (decile groups) of roughly equal size (see pages 8-10). Your 2006-2007 results were as follows:

Performance Level				Expected Value	Actual Value
Freshmen Well Below	Below	At	Above Well Above	1071	1056
Seniors Well Below	Below	At	Above Well Above	1198	1154
Difference 1 2	3 4*	5 6	7 8 9 10	126	98

* A value of 4 means that you performed better than at least 30 percent of four-year institutions.

2. How does my institution perform on other outcomes after taking into account institutional and student characteristics?

We also examined if other outcomes at your school—retention and graduation rates—were consistent with what would be expected given the characteristics of your students and institution. Using a regression modeling approach, we report your school's actual performance, what would be expected based on the models, and assign a performance level relative to all four-year institutions (see pages 13 and 21):

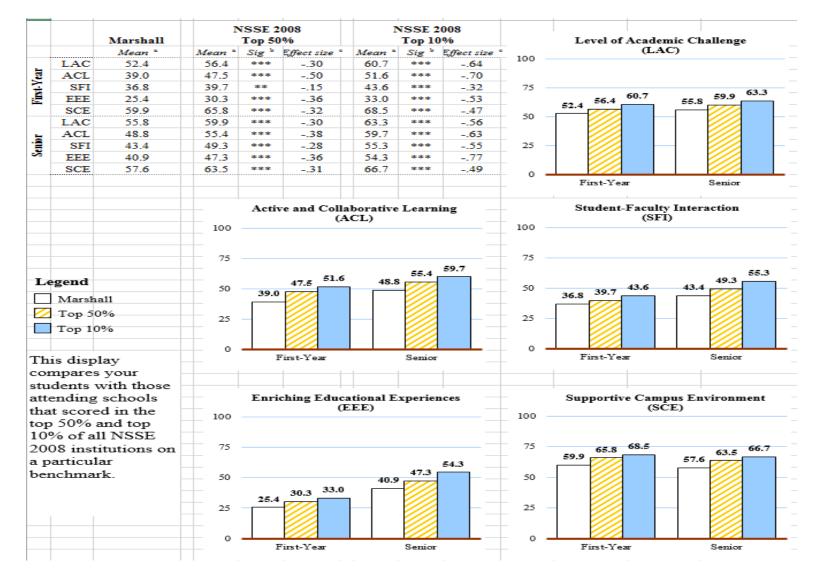
	Performance Level				Expected Value	Actual Value
First-year retention rate Well Below	Below	At	Above	Well Above	76	72
4-year graduation rate Well Below	Below	At	Above	Well Above	23	17
6-year graduation rate Well Below	Below	At	Above	Well Above	47	43

3. How should schools use these results?

We encourage schools to (1) communicate results across campus, (2) link student-level CLA results with other data sources, (3) pursue in-depth sampling and/or longitudinal studies, and (4) engage faculty in CLA in the Classroom—a new initiative.

A PowerPoint presentation accompanies this report to help you communicate CLA results and the CLA approach to campus constituencies. While institution-level CLA results operate as a signaling tool of overall institutional performance, student-level CLA results (see page 26 for detail) are provided for you to link with other data sources (e.g., course-taking patterns, grades, portfolio assessments, student satisfaction and engagement, major-specific tests, etc.). These internal analyses can help you identify hypotheses for additional research, which you can pursue through CLA in-depth sampling and/or longitudinal studies in subsequent years. Finally, CLA in the Classroom will launch in fall 2007 as a new initiative for participating institutions to connect the CLA results to work done by individual faculty. If a faculty member would like to assess the higher order skills of students in her/his class, these new materials will provide a way to begin that process. CLA in the Classroom resources—provided free of charge to institutions participating in the 2007–2008 CLA—will include one retired CLA task that can be administered locally, as well as an adapted scoring guide (so faculty can evaluate their students' work), and a discussion guide to be used with individual and/or groups of students.

Appendix III 2008 National Survey of Student Engagement (NSSE) Benchmark Comparison Report



Appendix IV

Faculty Senate Resolutions approving the Domains of Thinking and the Core Curriculum

Faculty Senate Recommendation that approved the Core Domains of Critical Thinking: 2008, taken from the Faculty Senate archived recommendations for academic year 2007 – 2008; http://www.marshall.edu/senate/recommendations/REC0708.htm

Recommendation	Committee of	Status of	Recommendation Summary
Number	Origin	Recommendation	
SR-07-08-(36) 67	CFAHC	Approved	Recommends that the attached Domain Model as prepared by the Core Foundations Ad Hoc Committee be endorsed as the possible foundation for the general education curriculum, the domains are: Critical Thinking; Scientific Thinking; Mathematical and Abstract Thinking; Ethical, Social and Historical Thinking; Multicultural and International Thinking; Aesthetic, Creative, and Artistic Thinking; Oral, Written, and Visual Communication; and Informational and Technical Literacy. This recommendation makes critical thinking the central concern of General Education classes, while developing vital skills in other areas and integrative ways of thinking. This model will focus on implementation of Marshall University's strategic vision.

Faculty Senate Recommendation that approved the Core Curriculum: 2009, taken from the Faculty Senate archived recommendations for academic year 2008 – 2009; http://www.marshall.edu/senate/recommendations/REC0809.htm

Recommendation	Committee of	Status of	Recommendation Summary
Number	Origin	Recommendation*	
SR-08-09-36R	CFAHC	Approved	Recommends that the Core Foundations Ad Hoc Committee's outline for a new general education curriculum henceforth called Core Curriculum, be approved.

Appendix V

Marshall's Invitation from the Higher Learning Commission to join Open Pathways Cohort 3



230 South LaSalle Street, Suite 7-500 | Chicago, IL 60604-1411 312-263-0456 | 800-621-7440 | Fax: 312-263-7462 | ncahlc.org

April 1, 2011

7.00

Dr. Stephen Kopp President Marshall University One John Marshall Drive Huntington, WV 25755

Dear Dr. Kopp,

In April 2009, the Commission introduced Pathways, a proposed new model for accreditation with the goals of creating more value for institutions, reducing the burden of repetitive data reporting, and enhancing rigor in ways that testify to the quality of higher education. Two cohorts of institutions are assisting the Commission in testing and refining the model during its development, and a third is now being formed. In participating in these demonstration projects, the institutions also fulfill the requirements of their next evaluation for continued accreditation.

I am writing to invite Marshall University to join the third cohort of the Pathways Demonstration Project.

This third cohort will play a distinctive role. The Open Pathway for reaffirmation of accreditation separates the Assurance Process from the Improvement Process. For the latter, institutions are required to undertake a Quality Initiative, either one that the institution designs independently or one that is undertaken by a group of institutions in concert. For this cohort, the Lumina Foundation has provided funding for institutions to examine and test Lumina's proposed Degree Qualifications Profile. The institutions will work independently, but they will also come together to share what they learn in the process.

The opening paragraph of the Lumina Foundation's document makes the claim that "A Degree Profile-or qualifications framework-illustrates clearly what students should be expected to know and be able to do once they earn their degrees-at any level. This Degree Profile thus proposes specific learning outcomes that benchmark the associate, bachelor's and master's degrees—which constitute the great majority of postsecondary degrees awarded by U.S. colleges and universities-regardless of a student's field of specialization." From June 2011 through summer 2013, institutions in the third cohort will test that claim. They will collaborate with the Commission and the Lumina Foundation in piloting the Degree Qualifications Profile with a subset of each institution's degree programs. They will evaluate programs using the Degree Profile as the instrument, figuring out how the Profile applies to each of the programs. They will compare their current curricula, supporting activity (such as co-curriculum), defined learning outcomes, and assessment results with the Degree Profile's outcomes for broad areas of learning, performance levels, cumulative integration of learning, and application of learning. In this way institutions will evaluate and provide commentary on the Profile itself, as well as evaluate and formulate plans to improve their programs. This work to test the Degree Qualifications Profile fully replaces the Commission's Improvement Process for the Open Pathway.

Beginning in the fall of 2013, institutions in this cohort will pilot and provide commentary to refine the Assurance Process of the Open Pathway, though by that time the two earlier cohorts will have done much of the development work. Through the Assurance Process and the project on the Degree Qualifications Profile, institutions in cohort three will achieve continued accreditation as part of the Pathways Demonstration Project.

If your institution accepts our invitation, you will have a unique opportunity to evaluate and comment on a document that may help transform U.S. higher education, with a focus on what students learn that is rich and complex, well beyond the reductionism of many efforts.

This packet includes the Pathways overview, the Degree Qualifications Profile, an Interest in Participation form, and an explanation of the benefits, obligations, and timeline for participating as a pioneer institution in cohort three. An institution's accreditation relationship will not be put at any risk by participation in the Open Pathway Demonstration Project. The institution and the Commission will sign a contract and a Special Emphasis Agreement that clearly define how the pioneer institution will achieve continued accreditation through the Demonstration Project.

We will be in touch with you within the next few weeks to answer questions and determine your interest. If you or others at your institution are planning to attend the Commission's Annual Conference, you may wish to hear Carol Geary Schneider's keynote address on Monday morning or attend the panel that will follow. Carol was one of the four authors of the proposed Degree Qualifications Profile; Paul Gaston, another of the authors, and Marcus Kolb of the Lumina Foundation will join the panel, which will be moderated by George Kuh.

You may also affirm your interest by completing and faxing back the enclosed Interest in Participation form. If you have any questions, please feel free to call or write to me or Mary B. Breslin B.V.M., your institutional liaison.

We are much energized by the prospect of joining our project to develop an accreditation process of greater immediacy for institutions with Lumina's effort to move U.S. higher education to a more fully articulated, shared understanding of what our various degrees mean. I hope you will be too.

Cordially,

Sylvia Manning President

Sylvia Manning

Appendix VI

Faculty Senate Approval of Baccalaureate Degree Profile

Faculty Senate Recommendation that approved the Marshall University Baccalaureate Degree Profile: 2013, taken from the Faculty Senate archived recommendations for academic year 2012 – 2013; http://www.marshall.edu/senate/recommendations/REC1213.htm

Recommendation Number	Committee of Origin	Status of Recommendation*	Recommendation Summary
SR-12-13-17	BAPC	Approved	Recommends approval of the Recommendation for Revision of Core Domains and adoption of the MU Degree Profile.

COMMITTEE RECOMMENDATION: Final

SR-12-13-17-BAPC

First, recommends approval of the revision (outlined below) to Marshall University's Core Domains of Critical Thinking. Second, recommends the adoption of the proposed learning outcomes for each domain.

Third, recommends adoption of this document as Marshall University's Baccalaureate Degree Profile

Proposed Domains of Critical Thinking	Proposed Learning Outcomes		
Communication Fluency	Students will develop cohesive oral, written, and visual communications tailored to specific audiences.		
Creative Thinking	Students will outline multiple divergent solutions to a problem, develop and explore risky or controversial		
	ideas, and synthesize ideas/expertise to generate innovations.		
Ethical and Civic Thinking	Students will determine the origins of core beliefs and ethical principles, evaluate the ethical basis of		
	professional rules and standards of conduct, evaluate how academic theories and public policy inform one		
	another to support civic well-being, and analyze complex ethical problems to address competing interests.		
Information Literacy	Students will revise their search strategies and employ appropriate research tools, integrate relevant		
	information from reliable sources, question and evaluate the complexity of the information environment,		
	and use information in an ethical manner.		
Integrative Thinking	Students will make connections and transfer skills and learning among varied disciplines, domains of		
	thinking, experiences, and situations.		
Intercultural Thinking	Students will evaluate generalizations about cultural groups, analyze how cultural beliefs might affect		
	communication across cultures, evaluate how specific approaches to global issues will affect multiple		
	cultural communities, and untangle competing economic, religious, social, or geographical interests of		
	cultural groups in conflict.		
Inquiry Based Thinking	Students will formulate focused questions and hypotheses, evaluate existing knowledge, collect and		
	analyze data, and draw justifiable conclusions.		
Metacognitive Thinking	Students will evaluate the effectiveness of their project plan or strategy to determine the degree of their		
	improvement in knowledge and skills.		
Quantitative Thinking	Students will analyze real-world problems quantitatively, formulate plausible estimates, assess the validity		
	of visual representations of quantitative information, and differentiate valid from questionable statistical		
	conclusions.		

RATIONALE:

In April 2011 Marshall University received an invitation from the Higher Learning Commission (HLC) of the North Central Association to test the Lumina Foundation's *Degree Qualifications Profile (DQP)*. In her letter to Dr. Stephen Kopp, dated April 1, 2011, Dr. Sylvia Manning, President of the HLC, stated, "The opening paragraph of the Lumina Foundation's document makes the claim the 'A Degree Profile – or qualifications framework – illustrates clearly what students should be expected to know and be able to do once they earn their degrees – at any level. This Degree Profile thus proposes specific learning outcomes that benchmark the associate, bachelor's and master's degrees – which constitute the great majority of postsecondary

Page 2

degrees awarded by U.S. colleges and universities – regardless of the student's field of specialization." She explained that Marshall University, in concert with other institutions, would be asked to test that claim.

Marshall University began this process with several goals in mind. They were

- 1. To use the DQP to help us critically examine our expected outcomes for students in each degree program and at each degree level.
- To examine the extent to which the broad areas of learning and degree appropriate outcomes outlined in the DQP align with outcomes
 expected of students who graduate with Associate's, Bachelor's and Master's degrees (in each degree program) from Marshall University.
- 3. To examine the reasons for lack of alignment between Marshall's and the DQP's degree expectations where lack of alignment exists.
- To point out where the DQP does not include outcomes faculty at Marshall University think are necessary for the well-educated Marshall graduate at each degree level.
- 5. To provide feedback to the HLC and to the Lumina Foundation for the purpose of improving the DQP.
- 6. To develop a degree profile unique to Marshall University.

Feedback revealed that a number of Marshall's degree programs did not align to these DQP broad areas of learning.

- 1. Civic Learning 31 out of 92 programs 34% did not align
- 2. Quantitative Fluency 25 out of 92 programs 27% did not align
- 3. Engaging Diverse Perspectives 24 out of 92 programs 26% did not align

When analyzing reasons for this lack of alignment, the following reason seemed especially important.

1. Some of the DQP's Broad Areas of Learning are too narrowly defined and this was especially true for the broad areas of learning to which our programs most frequently did not align.

In concert with the broader testing of the DQP and, cognizant of the information reported from Degree Programs, a group of 24 faculty has used the DQP as a diagnostic to examine the university's current core domains of thinking with the intention of more clearly defining the graduation expectations for all Marshall graduates, *regardless of major*, at each degree level. We propose that this be considered for adoption as the Marshall University Degree Profile.

Proposal Concerning Marshall's Core Domains of Critical Thinking

Page 3

DQP Domain	Current	Proposed	Rationale	Proposed Marshall Learning Outcomes
	Marshall	Marshall		
	Domains of	Domains of		
	Critical Thinking	Critical		
		Thinking		
Communication	Oral/Written/	Communication	Marshall's idea of this domain has not changed	Students will develop cohesive oral, written, and
Fluency	Visual	Fluency	– it still should include the three aspects of	visual communications tailored to specific
	Communication		communication. Since the outcome will make	audiences.
			this explicit, we argue that the term	
			"communication" in the domain is sufficient to	
			encompass all aspects of communication.	
None	Aesthetic/	Creative	This area of learning is not part of DQP, but is	Students will outline multiple divergent solutions to
	Artistic Thinking	Thinking	an important part of Marshall's Core	a problem, develop and explore risky or
			Domains. As currently written, though, the	controversial ideas, and synthesize ideas/expertise
			domain is too discipline-specific. We argue	to generate innovations.
			that the proposed name, "creative thinking"	
			expands this domain to include all disciplines	
		sul a las a	across campus.	
Civic Learning	Ethical/Social/	Ethical and Civic		Students will determine the origins of core beliefs
	Historical	Thinking	not – and consensus from the MU community	and ethical principles, evaluate the ethical basis of
	Thinking		during the testing of the DQP was that it's important to explicitly include ethics across all	professional rules and standards of conduct, evaluate how academic theories and public policy
			degree programs. We argue that the DQP	inform one another to support civic well-being, and
				analyze complex ethical problems to address
			it is broader, but inclusive of, social and	competing interests.
			historical thinking. Finally, in testing the DQP,	competing interests.
			we found that a significant number of	
			programs did not align to Civic Learning.	
			Therefore, we have written our outcome to be	
			broader than that of the DQP.	
Use of	Information/	Information	Consensus from the MU community during the	Students will revise their search strategies and
Information	Technical	Literacy	testing of the DQP was that "use of	employ appropriate research tools, integrate
Resources	Literacy		information resources" is an important	relevant information from reliable sources,
			learning domain. We propose to change MU's	question and evaluate the complexity of the
			current name from "information/technical	information environment, and use information
			literacy" to "information literacy" because the	in an ethical manner.
			latter suggests the level of analysis and	in an euncar manner.
			evaluation in which students should engage to	

Page 4

			critically examine information sources.	
Broad, Integrative Knowledge	None	Integrative Thinking	Although this is an element we propose be added to Marshall's Domains, we argue that it was implicitly included before, in both FYS and CT course designs. The addition of this domain simply makes its inclusion explicit.	Students will make connections and transfer skills and learning among varied disciplines, domains of thinking, experiences, and situations.
Engaging Diverse Perspectives	Multicultural/ International Thinking	Intercultural Thinking	Marshall faculty have expressed a commitment to multicultural and international learning at least since the inception of the "Marshall Plan" in the early 1990s. It continues to be a priority, e.g. the INTO project. However, we noted that a large number of Marshall's Degree Programs did not align to this DQP area of learning. Therefore, we have defined the Marshall Domain's outcome much more broadly than was the "Engaging Diverse Perspectives" outcome in the DQP.	Students will evaluate generalizations about cultural groups, analyze how cultural beliefs might affect communication across cultures, evaluate how specific approaches to global issues will affect multiple cultural communities, and untangle competing economic, religious, social, or geographical interests of cultural groups in conflict.
Analytic Inquiry	Scientific Thinking	Inquiry Based Thinking	In the testing of the DQP, there was consensus from MU's programs that analytic inquiry, which we argue broadly corresponded to MU's "scientific thinking" domain, is an important domain of thinking. Our current proposal modifies the DQP language because "analytic" suggests only one element of inquiry. Likewise, MU's current domain name, "scientific," suggests a narrowly defined method of inquiry.	Students will formulate focused questions and hypotheses, evaluate existing knowledge, collect and analyze data, and draw justifiable conclusions.
None	None	Metacognitive Thinking	We propose adding this domain of thinking based on input from Marshall faculty.	Students will evaluate the effectiveness of their project plan or strategy to determine the degree of their improvement in knowledge and skills.
Quantitative Fluency	Abstract/ Mathematical Thinking	Quantitative Thinking	A significant number of degree programs did not map to the Quantitative Fluency outcome in the DQP. Yet, the domain of "Abstract/Mathematical" thinking was included as part of Marshall's original Core Domains and there is national consensus that quantitative fluency is an essential skill. Therefore, we developed the MU outcome to	Students will analyze real-world problems quantitatively, formulate plausible estimates, assess the validity of visual representations of quantitative information, and differentiate valid from questionable statistical conclusions.

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			be more broadly stated than the ones in the DQP. The recommended domain name change from the original MU Core Domain wording to that of the DQP is recommended to emphasize the interdisciplinary nature of this domain.	
Applied Learning	None	None	Not explicitly included in our proposed Degree Profile. However, most assessments, especially at the capstone level, will require application.	N/A
Specialized Knowledge	None	None	Specialized Knowledge will be part of the outcomes of each degree program and, therefore, will differ among degree programs. However, it is expected that students will use specialized knowledge to demonstrate the domains of critical thinking.	N/A

COMMITTEE RECOMMENDATION

SR-12-13-17 BAPC

Recommends approval of the Recommendation for Revision of Core Domains and adoption of MU Degree Profile.

RATIONALE: The objective is to accurately and uniquely define Marshall University's Core Domains and Learning Outcomes.

The recommendations are to:

- Revise the University's Core Domains of Critical Thinking as proposed in the document titled "Recommendation for Revision of Core Domains and adoption of MU Degree Profile".
- Adopt learning outcomes for each Domain of Critical Thinking as proposed in the document titled "Recommendation for Revision of Core Domains and adoption of MU Degree Profile".
- Adopt the document as a component of Marshall University's Degree Profile at the Baccalaureate Level.

This recommendation is based on the document developed by a core group of 24 faculty members representing each undergraduate college in the university and as revised based on feedback received from members of the University Assessment Committee, the General Education Council, and faculty senators.

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FACULTY SENATE CHAIR:

DATE: 1-31-13
D. ITT
DATE:
DATE: =/13/13
DATE:
ed (after their December meeting) and approved vision of Core Domains and adoption of MU

Appendix VII

Faculty Senate Recommendation and the Master Syllabus Template

Faculty Senate Recommendation that approved the amendment to the Marshall University Board of Governors' Syllabus Policy (AA-14): 2012, taken from the Faculty Senate archived recommendations for academic year 2011 – 2012; http://www.marshall.edu/senate/recommendations/REC1112.htm

Recommendation Number		Status of Recommendation*	Recommendation Summary
SR-11-12-(22) 60	BAPC	Approved	Recommends that the MU Board of Governors Policy No. AA-14 Course Syllabus be revised.

Please note: This template includes only items required in accordance with MUBOG Policy No. AA-14. You are free (and encouraged) to add additional information you feel is necessary to enhance student learning in your course.

Marshall University Syllabus Template

Course Title/Number	
Semester/Year	
Days/Time	
Location	
Instructor	
Office	
Phone	
E-Mail	
Office/Hours	
University Policies	By enrolling in this course, you agree to the University Policies listed below. Please
	read the full text of each policy be going to www.marshall.edu/academic-affairs and clicking on "Marshall University Policies." Or, you can access the policies directly by going to www.marshall.edu/academic-affairs/policies/ . Academic Dishonesty/ Excused Absence Policy for Undergraduates/ Computing Services Acceptable Use/ Inclement Weather/ Dead Week/ Students with Disabilities/ Academic Forgiveness/ Academic Probation and Suspension/ Academic Rights and Responsibilities of Students/ Affirmative Action/ Sexual Harassment

Course Description: From Catalog		

The table below shows the following relationships: How each student learning outcomes will be practiced and assessed in the course.

Course Student Learning Outcomes	How students will practice each outcome in this Course	How student achievement of each outcome will be assessed in this Course
Students will	[list relevant learning activities here – e.g. group work, discussion, in-class exercises, chapter reviews, low-stakes writing, practice presentations, etc.]	[list assessments—exam questions, papers, projects presentations—that evaluate mastery of this particular outcome]
Students will		

Required Texts, Additional Reading, and Other Materials	
1.	_
2.	
3.	
Course Requirements / Due Dates	_
1.	_
2.	
3.	
Grading Policy	
Attendance Policy	_
[Note that for undergraduate courses, the attendance policy may not violate the University's excused absence policy.]	
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Course Schedule

Appendix VIII

List of Critical Thinking (CT) Courses by College, Showing Date of Initial Approval and Date of Review as Recorded by the General Education Council

Academic College	Critical Thinking Course	Initial Approval Date	Review Date (Approval)
Arts and Media	MUS 105: Critical Thinking Music (CT)	Fall 2010	
	MUS 210: Introduction to Electronic Music (CT)	04/01/2011	
Business	ACC 215: Accounting Principles (CT)	Spring 2014	
	BUSN 141: Business in the News (CT)	Spring 2011	
	FIN 175: Personal Finance (CT)	Spring 2016	
	FIN 201: Personal Finance (CT)	Fall 2015	
Education and	CI 100: Critical Thinking in Education (CT)	Fall 2011	
Professional	ECE 102: Early Childhood Programs (CT)	09/24/2010	
Development	EGE 102. Larry Childridou Frograms (CT)	09/24/2010	
Health Professions	CLS 105: Medical-Lab Terminology (CT)	01/13/2010	
	ESS 218: Sports in Society (CT)	Summer 2013	
	HS 200: Comp Medical Terminology (CT)	Fall 2012	
	PH 270: Global Health (CT)	Spring 2014	
	SWK 210: Social Justice & Human Behavior (CT)	Spring 2011	
Liberal Arts	ANT 201: Cultural Anthropology (CT)	01/13/2010	
Liberal Alts	ANT 2011: Cultural Anthropology (C1) ANT 201H: Cultural Anthropology Honors (CT)	01/13/2010	
	CL 210: Love/War in the Ancient World (CT)	Fall 2010	
	CL 232: Greek and Roman Drama (CT)	11/21/2013	
	CL 233: Greek and Roman Historians (CT)	11/21/2013	
	CL 234: Greek and Roman Poetry (CT)	Fall 2015	
	CL 236: Murder in the Ancient World (CT)	02/04/2011	
	CL 237: Literature in the Time of Nero (CT)	11/21/2013	
	CL 250: Studies in Humanities (CT)	Spring 2016	
	CMM 201: Communication Foundations (CT)	09/24/2010	
	CMM 205: The Rhetorical World (CT)	09/24/2010	
	ENG 200: Texting the World (CT)	Fall 2010	
	ENG 200H: Texting the World Honors (CT)	Fall 2010	
	ENG 205: Popular Literature (CT)	02/04/2011	
	GEO 100: Introduction to Human	01/13/2010	
	Geography (CT)		
	GEO 101: Physical Geography (CT)	Fall 2011	
	GEO 203: Economic Geography (CT)	Spring 2014	
	GEO 222: Global Environment Issues (CT)	10/22/2010	<u> </u>
	GEO 230: Introduction to Meteorology (CT)	Fall 2011	
	HST 101: Great Civilizations to 1300 (CT)	Summer 2010	
	HST 101H: Great Civilizations to 1300 Honors (CT)	Summer 2010	

	HST 102: World and West 1300-1850 (CT)	Fall 2010
	HST 102H: World and West 1300-1850 Honors (CT)	Fall 2010
		0
	HST 103: The World Since 1850 (CT)	Summer 2010
	HST 103H: The World Since 1850 Honors (CT)	09/24/2010
	HST 208: The Developing World (CT)	Fall 2010
	HST 230: American History to 1877 (CT)	Summer 2010
	HST 231: American History from 1877 (CT)	Fall 2010
	JPN 240: Japanese Culture (CT)	11/15/2012
	JPN 245: Modern Japanese Literature	Spring 2014
	(CT)	
	JPN 250: Japanese Anime and Manga (CT)	Fall 2013
	MDL 100: Culture and Language (CT)	
	PHL 250: Studies in Humanities (CT)	
	PSC 104: American National Government and Politics (CT)	02/12/2012
	PSC 105: Fundamentals of Politics (CT)	09/02/2011
	PSC 207: Comparative Politics (CT)	Spring 2012
	PSC 209: Fundamentals of International	02/24/2014
	Relations (CT)	
	PSY 201: General Psychology (CT)	09/02/2011
	PSY 201H: General Psychology Honors	09/02/2011
	(CT)	
	RST 250: Studies in Humanities (CT)	Spring 2016
	SOC 200: Introduction to Sociology (CT)	01/13/2010
	SOC 200H: Introduction to Sociology Honors (CT)	01/13/2010
	SPN 240: Spanish Society and Life (CT)	11/15/2012
	SPN 245: Chicano/a Identities (CT)	Spring 2013
Science	IST 120: Connections I (CT)	01/13/2010
	IST 220: Connections II (CT)	01/13/2010
	MTH 121: Concepts and Applications (CT)	Fall 2010
	MTH 121B: Concepts and Applications (CT)	Fall 2010
	MTH 125: Mathematical Thinking (CT)	Fall 2010
	MTH 160: Applied Mathematical	Spring 2014
	Reasoning (CT)	
	MTH 229: Calculus/Analytic Geometry I (CT)	03/04/2011
	MTH 229: Calculus I Honors (CT)	03/04/2011
	PHY 190: Overview of Physics (CT)	Fall 2015
	PS 101: Introductory Astronomy (CT)	10/26/2012
Information	CS 105: Exploring the World with	Fall 2013
Technology and	Computing (CT)	
Engineering	SFT 235: Introduction to Safety (CT)	11/21/2013

Appendix IX

Core II Courses

Gen Ed Area	Hours	Course	Academic College
	Required		offering Course
Composition	6	ENG 101: English Composition I	Liberal Arts
	•	ENG 101A: English Composition for Foreign	
		Students	
		ENG 101P: Beginning Composition Plus	
		ENG 102: English Composition II	
		ENG 200H: Texting the World Honors (CT)	
		ENG 201: Advanced Composition	
		ENG 201H: Advanced Composition Honors	
Communications	3	CMM 103: Fundamentals of Speech-	Liberal Arts
Communications	3	Communication	Liberal Arts
		CMM 104H: Honors in Speech Communication	
		CMM 207: Business and Professional	
		Communication	
		Communication	
Mathematics	3	MTH 110: Introduction to College Mathematics	Science
		MTH 120: Algebra	
		MTH 121: Concepts and Applications (CT)	
		MTH 121B: Concepts and Applications (CT)	
		MTH 122: Plane Trigonometry	
		MTH 123: Selected Topics in College Algebra	
		MTH 123E: Selected Topics in College Algebra	
		Online	
		MTH 125: Mathematical Thinking (CT)	
		MTH 127: College Algebra Expanded	
		MTH 130: College Algebra	
		MTH 130E: College Algebra Expanded Online	
		MTH 130H: College Algebra Honors	
		MTH 131: Calculus/Analytic Geometry I	
		MTH 132: Pre-Calculus with Scientific Applications	
		MTH 140: Applied Calculus	
		MTH 160: Applied Mathematics Reasoning	
		MTH 190: Introductory Calculus	
		MTH 203: Calculus for Business	
		MTH 220: Discrete Structures	
		MTH 225: Introductory Statistics	
		MTH 229: Calculus/Analytic Geometry I (CT)	
		MTH 229H: Calculus I Honors (CT)	
		MTH 230: Calculus/Analytic Geometry II	
		MTH 231: Calculus/Analytic Geometry III	
		MTH 280: Special Topics: Algebra Excel Lab	
		MTH 281: Special Topics: Excel	
		MTH 282: Special Topics: Excel	
		MTH 283: Special Topics: Modern Business	
		Calculus	
Physical and	4	PSC 104: Introduction to Piology	Science
Natural Science	4	BSC 104: Introduction to Biology	Science
ivatural Science		BSC 105: Introduction to Biology	
		BSC 120: Principles of Biology BSC 121: Principles of Biology	
		I DOU 121. Principles of biology	I
			1
		BSC 228: Human Physiology BSC 250: Microbiology and Human Disease	

		101111111111111111111111111111111111111	
		CHM 211: Principles of Chemistry I	
		CHM 212: Principles of Chemistry II	
		CHM 217: Principles of Chemistry Lab I	
		CHM 218: Principles of Chemistry Lab II	
		GLY 100: Geologic Hazards and Resources	
		GLY 110: General Geology	
		GLY 150: Introduction to Oceanography	
		GLY 150L: Introduction to Oceanography Lab	
		GLY 200: Physical Geology	
		GLY 210L: Earth Materials Lab	
		ISC 200: Energy: Synthesis to Steam	
		ISC 201: Biotechnology	
		ISC 202: Freshwaters of the World	
		ISC 205: Introduction to Forensic Science	
		ISC 208: Evolution: Process of Change	
		ISC 209: Chemistry in the Home	
		ISC 211: Living on Earth	
		IST 111: Living Systems	
		IST 131: Analytic Methods II Differential Calculus	
		IST 224: Introduction to Forensic Science	
		IST 230: Analytic Methods III-Integral Calculus	
		PHY 101: Conceptual Physics	
		PHY 101L: Conceptual Physics Lab	
		PHY 201: General Physics	
		PHY 202: General Physics Lab	
		PHY 203: General Physics	
		PHY 204: General Physics Lab	
		PHY 211: Principles of Physics	
		PHY 213: Principles of Physics	
		PS 101: Introductory Astronomy (CT)	
		PS 109: General Physical Science	
		PS 109L: General Physical Science Lab	
		PS 110: General Physical Science	
		PS 110L: General Physical Science Lab	
		1 0 110L. General i flysical ocience Lab	
Social Science	3	ANT 201: Cultural Anthropology (CT)	Liberal Arts
Goolal Golollog	•		Liboral Alto
		I ANT 201H: Cultural Anthropology Honors (CT)	
		ANT 201H: Cultural Anthropology Honors (CT)	
		CMM 213: Fundamentals of Interpersonal	
		CMM 213: Fundamentals of Interpersonal Communication	
		CMM 213: Fundamentals of Interpersonal Communication CMM 255: Introduction to Computer Communication	
		CMM 213: Fundamentals of Interpersonal Communication CMM 255: Introduction to Computer Communication GEO 100: Introduction to Human Geography (CT)	
		CMM 213: Fundamentals of Interpersonal Communication CMM 255: Introduction to Computer Communication GEO 100: Introduction to Human Geography (CT) GEO 203: Economic Geography (CT)	
		CMM 213: Fundamentals of Interpersonal Communication CMM 255: Introduction to Computer Communication GEO 100: Introduction to Human Geography (CT) GEO 203: Economic Geography (CT) GEO 206: Geography of West Virginia	
		CMM 213: Fundamentals of Interpersonal Communication CMM 255: Introduction to Computer Communication GEO 100: Introduction to Human Geography (CT) GEO 203: Economic Geography (CT) GEO 206: Geography of West Virginia GEO 222: Global Environmental Issues	
		CMM 213: Fundamentals of Interpersonal Communication CMM 255: Introduction to Computer Communication GEO 100: Introduction to Human Geography (CT) GEO 203: Economic Geography (CT) GEO 206: Geography of West Virginia GEO 222: Global Environmental Issues HST 101: Great Civilizations to 1300 (CT)	
		CMM 213: Fundamentals of Interpersonal Communication CMM 255: Introduction to Computer Communication GEO 100: Introduction to Human Geography (CT) GEO 203: Economic Geography (CT) GEO 206: Geography of West Virginia GEO 222: Global Environmental Issues HST 101: Great Civilizations to 1300 (CT) HST 102: The World and the West 1300-1850 (CT)	
		CMM 213: Fundamentals of Interpersonal Communication CMM 255: Introduction to Computer Communication GEO 100: Introduction to Human Geography (CT) GEO 203: Economic Geography (CT) GEO 206: Geography of West Virginia GEO 222: Global Environmental Issues HST 101: Great Civilizations to 1300 (CT) HST 102: The World and the West 1300-1850 (CT) HST 103: The World since 1850 (CT)	
		CMM 213: Fundamentals of Interpersonal Communication CMM 255: Introduction to Computer Communication GEO 100: Introduction to Human Geography (CT) GEO 203: Economic Geography (CT) GEO 206: Geography of West Virginia GEO 222: Global Environmental Issues HST 101: Great Civilizations to 1300 (CT) HST 102: The World and the West 1300-1850 (CT) HST 103: The World since 1850 (CT)	
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		CMM 213: Fundamentals of Interpersonal Communication CMM 255: Introduction to Computer Communication GEO 100: Introduction to Human Geography (CT) GEO 203: Economic Geography (CT) GEO 206: Geography of West Virginia GEO 222: Global Environmental Issues HST 101: Great Civilizations to 1300 (CT) HST 102: The World and the West 1300-1850 (CT) HST 103: The World since 1850 (CT) HST 103H: The World since 1850 Honors (CT) HST 125: American Business History HST 200: History Methods Workshop	
		CMM 213: Fundamentals of Interpersonal Communication CMM 255: Introduction to Computer Communication GEO 100: Introduction to Human Geography (CT) GEO 203: Economic Geography (CT) GEO 206: Geography of West Virginia GEO 222: Global Environmental Issues HST 101: Great Civilizations to 1300 (CT) HST 102: The World and the West 1300-1850 (CT) HST 103: The World since 1850 (CT) HST 103H: The World since 1850 Honors (CT) HST 125: American Business History HST 200: History Methods Workshop HST 205: English History to 1642	
		CMM 213: Fundamentals of Interpersonal Communication CMM 255: Introduction to Computer Communication GEO 100: Introduction to Human Geography (CT) GEO 203: Economic Geography (CT) GEO 206: Geography of West Virginia GEO 222: Global Environmental Issues HST 101: Great Civilizations to 1300 (CT) HST 102: The World and the West 1300-1850 (CT) HST 103: The World since 1850 (CT) HST 103H: The World since 1850 Honors (CT) HST 125: American Business History HST 200: History Methods Workshop HST 205: English History to 1642 HST 206: English History after 1642	
		CMM 213: Fundamentals of Interpersonal Communication CMM 255: Introduction to Computer Communication GEO 100: Introduction to Human Geography (CT) GEO 203: Economic Geography (CT) GEO 206: Geography of West Virginia GEO 222: Global Environmental Issues HST 101: Great Civilizations to 1300 (CT) HST 102: The World and the West 1300-1850 (CT) HST 103: The World since 1850 (CT) HST 103H: The World since 1850 Honors (CT) HST 125: American Business History HST 200: History Methods Workshop HST 205: English History to 1642 HST 206: English History after 1642 HST 208: The Developing World (CT)	
		CMM 213: Fundamentals of Interpersonal Communication CMM 255: Introduction to Computer Communication GEO 100: Introduction to Human Geography (CT) GEO 203: Economic Geography (CT) GEO 206: Geography of West Virginia GEO 222: Global Environmental Issues HST 101: Great Civilizations to 1300 (CT) HST 102: The World and the West 1300-1850 (CT) HST 103: The World since 1850 (CT) HST 103H: The World since 1850 Honors (CT) HST 125: American Business History HST 200: History Methods Workshop HST 205: English History to 1642 HST 206: English History after 1642 HST 208: The Developing World (CT) HST 219: Ancient History	
		CMM 213: Fundamentals of Interpersonal Communication CMM 255: Introduction to Computer Communication GEO 100: Introduction to Human Geography (CT) GEO 203: Economic Geography (CT) GEO 206: Geography of West Virginia GEO 222: Global Environmental Issues HST 101: Great Civilizations to 1300 (CT) HST 102: The World and the West 1300-1850 (CT) HST 103: The World since 1850 (CT) HST 103H: The World since 1850 Honors (CT) HST 125: American Business History HST 200: History Methods Workshop HST 205: English History to 1642 HST 206: English History after 1642 HST 208: The Developing World (CT) HST 219: Ancient History HST 220: European History Medieval	
		CMM 213: Fundamentals of Interpersonal Communication CMM 255: Introduction to Computer Communication GEO 100: Introduction to Human Geography (CT) GEO 203: Economic Geography (CT) GEO 206: Geography of West Virginia GEO 222: Global Environmental Issues HST 101: Great Civilizations to 1300 (CT) HST 102: The World and the West 1300-1850 (CT) HST 103: The World since 1850 (CT) HST 103H: The World since 1850 Honors (CT) HST 125: American Business History HST 200: History Methods Workshop HST 205: English History to 1642 HST 206: English History after 1642 HST 208: The Developing World (CT) HST 219: Ancient History HST 220: European History Medieval HST 221: War in Modern Times	
		CMM 213: Fundamentals of Interpersonal Communication CMM 255: Introduction to Computer Communication GEO 100: Introduction to Human Geography (CT) GEO 203: Economic Geography (CT) GEO 206: Geography of West Virginia GEO 222: Global Environmental Issues HST 101: Great Civilizations to 1300 (CT) HST 102: The World and the West 1300-1850 (CT) HST 103: The World since 1850 (CT) HST 103H: The World since 1850 Honors (CT) HST 125: American Business History HST 200: History Methods Workshop HST 205: English History to 1642 HST 206: English History after 1642 HST 208: The Developing World (CT) HST 219: Ancient History HST 220: European History Medieval HST 221: War in Modern Times HST 223: Rise and Fall of Nazi Germany	
		CMM 213: Fundamentals of Interpersonal Communication CMM 255: Introduction to Computer Communication GEO 100: Introduction to Human Geography (CT) GEO 203: Economic Geography (CT) GEO 206: Geography of West Virginia GEO 222: Global Environmental Issues HST 101: Great Civilizations to 1300 (CT) HST 102: The World and the West 1300-1850 (CT) HST 103: The World since 1850 (CT) HST 103H: The World since 1850 Honors (CT) HST 125: American Business History HST 200: History Methods Workshop HST 205: English History to 1642 HST 206: English History after 1642 HST 208: The Developing World (CT) HST 219: Ancient History HST 220: European History Medieval HST 221: War in Modern Times	

	HST 231H: American History from 1877 Honors	
	(CT)	
	HST 250: Women in US History	
	HST 260: Rise of Islam 570-1750	
	HST 265: Modern East Asia	
	PSC 104: American National government and	
	Politics (CT)	
	PSC 105: Fundamentals of Politics (CT) PSC 202: American State Government and Politics	
	PSC 207: Comparative Politics (CT)	
	PSC 209: Fundamentals of International Relations	
	(CT)	
	PSC 211: Scope and Methods in Political Science	
	PSC 233: Introduction to Public Policy	
	PSY 201: General Psychology (CT)	
	PSY 201H: General Psychology Honors (CT)	
	PSY 223: Elementary Behavioral Statistics	
	SOC 200: Introductory Sociology (CT)	
	SOC 200H: Introductory Sociology Honors (CT)	
	CJ 200: Introduction to Criminal Justice	Science
	CJ 211: Introduction to Law Enforcement	
	CJ 221: Introduction to Criminal Courts	
	CJ 231: Introduction to Corrections	
	CJ 241: Victims of Crime	
Humanities 3	CL 210: Love/War in the Ancient World (CT)	Liberal Arts
Trainanties 3	CL 230: Greek and Roman Epic	Liberal Arts
	CL 231: Women in Greek and Roman Literature	
	CL 232: Greek and Roman Drama (CT)	
	CL 233: Greek and Roman Historians (CT)	
	CL 234: Greek and Roman Poetry (CT)	
	CL 235: The Ancient Novel	
	CL 236: Murder in the Ancient World (CT)	
	CL 237: Literature in the Time of Nero (CT)	
	CL 250: Studies in Humanities (CT)	
	CMM 205: The Rhetorical World (CT)	
	CMM 205: The Rhetorical World (CT) CMM 239: Development and Appreciation of Film to	
	CMM 205: The Rhetorical World (CT) CMM 239: Development and Appreciation of Film to 1930	
	CMM 205: The Rhetorical World (CT) CMM 239: Development and Appreciation of Film to 1930 CMM 240: Voice and Diction	
	CMM 205: The Rhetorical World (CT) CMM 239: Development and Appreciation of Film to 1930 CMM 240: Voice and Diction ENG 200: Texting the World (CT)	
	CMM 205: The Rhetorical World (CT) CMM 239: Development and Appreciation of Film to 1930 CMM 240: Voice and Diction ENG 200: Texting the World (CT) ENG 200H: Texting the World Honors (CT)	
	CMM 205: The Rhetorical World (CT) CMM 239: Development and Appreciation of Film to 1930 CMM 240: Voice and Diction ENG 200: Texting the World (CT) ENG 200H: Texting the World Honors (CT) ENG 202: Writing about Literature	
	CMM 205: The Rhetorical World (CT) CMM 239: Development and Appreciation of Film to 1930 CMM 240: Voice and Diction ENG 200: Texting the World (CT) ENG 200H: Texting the World Honors (CT)	
	CMM 205: The Rhetorical World (CT) CMM 239: Development and Appreciation of Film to 1930 CMM 240: Voice and Diction ENG 200: Texting the World (CT) ENG 200H: Texting the World Honors (CT) ENG 202: Writing about Literature ENG 203: Appalachian Literature	
	CMM 205: The Rhetorical World (CT) CMM 239: Development and Appreciation of Film to 1930 CMM 240: Voice and Diction ENG 200: Texting the World (CT) ENG 200H: Texting the World Honors (CT) ENG 202: Writing about Literature ENG 203: Appalachian Literature ENG 205: Popular Literature (CT) ENG 206: Good Plays ENG 209: Literature of Fantasy	
	CMM 205: The Rhetorical World (CT) CMM 239: Development and Appreciation of Film to 1930 CMM 240: Voice and Diction ENG 200: Texting the World (CT) ENG 200H: Texting the World Honors (CT) ENG 202: Writing about Literature ENG 203: Appalachian Literature ENG 205: Popular Literature (CT) ENG 206: Good Plays ENG 209: Literature of Fantasy ENG 210: Autobiography	
	CMM 205: The Rhetorical World (CT) CMM 239: Development and Appreciation of Film to 1930 CMM 240: Voice and Diction ENG 200: Texting the World (CT) ENG 200H: Texting the World Honors (CT) ENG 202: Writing about Literature ENG 203: Appalachian Literature ENG 205: Popular Literature (CT) ENG 206: Good Plays ENG 209: Literature of Fantasy ENG 210: Autobiography ENG 211: Science Fiction	
	CMM 205: The Rhetorical World (CT) CMM 239: Development and Appreciation of Film to 1930 CMM 240: Voice and Diction ENG 200: Texting the World (CT) ENG 200H: Texting the World Honors (CT) ENG 202: Writing about Literature ENG 203: Appalachian Literature ENG 205: Popular Literature (CT) ENG 206: Good Plays ENG 209: Literature of Fantasy ENG 210: Autobiography ENG 211: Science Fiction ENG 212: Sports Literature	
	CMM 205: The Rhetorical World (CT) CMM 239: Development and Appreciation of Film to 1930 CMM 240: Voice and Diction ENG 200: Texting the World (CT) ENG 200H: Texting the World Honors (CT) ENG 202: Writing about Literature ENG 203: Appalachian Literature ENG 205: Popular Literature (CT) ENG 206: Good Plays ENG 209: Literature of Fantasy ENG 210: Autobiography ENG 211: Science Fiction ENG 213: Good Poems	
	CMM 205: The Rhetorical World (CT) CMM 239: Development and Appreciation of Film to 1930 CMM 240: Voice and Diction ENG 200: Texting the World (CT) ENG 200H: Texting the World Honors (CT) ENG 202: Writing about Literature ENG 203: Appalachian Literature ENG 205: Popular Literature (CT) ENG 206: Good Plays ENG 209: Literature of Fantasy ENG 210: Autobiography ENG 211: Science Fiction ENG 212: Sports Literature ENG 213: Good Poems ENG 214: Introduction to Comics	
	CMM 205: The Rhetorical World (CT) CMM 239: Development and Appreciation of Film to 1930 CMM 240: Voice and Diction ENG 200: Texting the World (CT) ENG 200H: Texting the World Honors (CT) ENG 202: Writing about Literature ENG 203: Appalachian Literature ENG 205: Popular Literature (CT) ENG 206: Good Plays ENG 209: Literature of Fantasy ENG 210: Autobiography ENG 211: Science Fiction ENG 212: Sports Literature ENG 213: Good Poems ENG 214: Introduction to Comics ENG 215: Good Novels	
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	CMM 205: The Rhetorical World (CT) CMM 239: Development and Appreciation of Film to 1930 CMM 240: Voice and Diction ENG 200: Texting the World (CT) ENG 200H: Texting the World Honors (CT) ENG 202: Writing about Literature ENG 203: Appalachian Literature ENG 205: Popular Literature (CT) ENG 206: Good Plays ENG 209: Literature of Fantasy ENG 210: Autobiography ENG 211: Science Fiction ENG 212: Sports Literature ENG 213: Good Poems ENG 214: Introduction to Comics ENG 215: Good Novels ENG 220: The Political Novel	
	CMM 205: The Rhetorical World (CT) CMM 239: Development and Appreciation of Film to 1930 CMM 240: Voice and Diction ENG 200: Texting the World (CT) ENG 200H: Texting the World Honors (CT) ENG 202: Writing about Literature ENG 203: Appalachian Literature ENG 205: Popular Literature (CT) ENG 206: Good Plays ENG 209: Literature of Fantasy ENG 210: Autobiography ENG 211: Science Fiction ENG 212: Sports Literature ENG 213: Good Poems ENG 214: Introduction to Comics ENG 215: Good Novels ENG 220: The Political Novel ENG 221: Postcolonial Literature	
	CMM 205: The Rhetorical World (CT) CMM 239: Development and Appreciation of Film to 1930 CMM 240: Voice and Diction ENG 200: Texting the World (CT) ENG 200H: Texting the World Honors (CT) ENG 202: Writing about Literature ENG 203: Appalachian Literature ENG 205: Popular Literature (CT) ENG 206: Good Plays ENG 209: Literature of Fantasy ENG 210: Autobiography ENG 211: Science Fiction ENG 212: Sports Literature ENG 213: Good Poems ENG 214: Introduction to Comics ENG 215: Good Novels ENG 220: The Political Novel ENG 221: Postcolonial Literature ENG 225: Southern Literature ENG 231: Good Stories	

	1	TENO OLI ELLI LIVI	
		ENG 241: Ethnic Literatures	4
		ENG 242: Women Writers	_
		FRN 240: French Society and Life	1
		GER 240: German Society and Life	_
		JPN 240: Japanese Culture	_
		JPN 245: Modern Japanese Literature (CT)	
		JPN 250: Japanese Anime and Manga (CT)	
		PHL 200: Introduction to the Philosophy of the	
		Ancient Period	
		PHL 200H: Introduction to the Philosophy of the	
		Ancient Period Honors	
		PHL 201: Introduction to Philosophy of the Modern	
		Period	
		PHL 250: Studies in Humanities (CT)	
		RST 205: Religious Traditions of the West	
		RST 206: Religious Traditions of Asia	
		RST 220: Literature of the Old Testament	
		RST 225: Literature of the New Testament	
		RST 250: Studies in Humanities (CT)	
		SPN 240: Spanish Society and Life	
		SPN 245: Chicano/a Identities (CT)	
		HON 200: Second Year Seminar	Honors
		JMC 101: Media Literacy	Arts and Media
Fine Arts	3	ART 112: Art Appreciation	Arts and Media
		ART 112E: Introduction to Visual Arts	
		FA 101: Introduction to the Arts]
		MUS 142: Music in Society]
		MUS 200: Introduction to World Music]
		MUS 210: Introduction to Electronic Music (CT)]
		THE 112: Theatre Appreciation]
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Appendix X

List of Current Multicultural (MC) and International (INT) Courses, Showing Date of Initial Approval and Date of Review as Recorded by the General Education Council

Multicultural

Academic College	Multicultural Course	Initial Approval Date	Review Date (Approval)	
Arts and Media	MUS 142: Music in Society	04/01/2011		
7 ii to arra moara	MUS 200: Introduction to World Music	0 1/0 1/2011	12/12/2012	
Business	N/A			
Dusiness	IVA			
Education and Professional Education Development CI 459: Multicultural Influence in Education		10/22/2010		
Health Professions	ESS 118: Development of Physical Education and Sport in the United States			
	ESS 218: Sports in Society	Summer 2009		
	ESS 418: Ancient and Medieval Sport History	Fall 2010		
	MI 411: Transcultural Healthcare	Spring 2013		
	NUR 400: Transcultural Health Care		12/12/2012	
	SWK 203: Introduction to Social Work		12/12/2012	
	SWK 210: Social Justice and Human Behavior	Spring 2011		
	SWK 312: Human Behavior and the Social Environment			
	SWK 320: Social Work Practice I		11/15/2012	
	SWK 322: Social Work Practice II			
	SWK 332: Social Welfare Policy and Legislation		12/12/2012	
	SWK 473: Social Work Practicum II		11/15/2012	
Liberal Arts	ANT 362: Health Culture and Society	Spring 2013		
	ANT 464: Design, Planning and Health	Fall 2016		
	ANT 472: Language, Gender, and the Body	04/05/2013		
	ANT 491: Theory in Ethnology	10/26/2012		
	CL 230: Greek and Roman Epic	02/17/2012		
	CL 231: Women in Greek and Roman Literature			
	CL 232: Greek and Roman Drama (CT)	02/17/2012		
	CL 233: Greek and Roman Historians (CT)	Fall 2012		
	CL 234: Greek and Roman Poetry (CT)	Spring 2011		
	CL 236: Murder in the Ancient World (CT)	Summer 2010		
	CL 237: Literature in the time of Nero	02/17/2012		
	CL 250: Studies in Humanities (CT)	Spring 2016		
	CL 319: Classical Mythology			
	CMM 322: Intercultural Communication		12/12/2012	
	CMM 330: Performance Theory	10/26/2012		
	ENG 203: Appalachian Literature	Spring 2011		

	ENG 221: Postcolonial Literature	10/03/2013	
	ENG 240: African American Literatures	Fall 2010	
	ENG 241: Ethnic Literatures	Fall 2010 11/15/2012	
	ENG 430: Young Adult Literature		
	ENG 466: Literacy Studies GER 405: German Civilization and	Spring 2015 10/26/2012	
		10/26/2012	
	Culture GER 406: German Civilization and	10/26/2012	
	Culture	10/20/2012	
	HST 101: Great Civilizations to 1300		
	(CT)		
	HST 102: World and West 1300-1850		
	(CT)		
	HST 219: Ancient History	Summer 2010	
	HST 230: American History to 1877	Summer 2010	
	(CT)		
	HST 231: American History from 1877		
	(CT)		
	HST 312: African-American History		
	HST 360: Race and Sport in US History	Fall 2010	
	HST 362: The Crusades	Fall 2015	
	HST 365: Modern Civil Rights	Summer 2011	
	Movement		
	PHL 250: Studies in Humanities (CT)	Spring 2016	
	PSC 376: Black Politics	Fall 2012	
	PSY 426: Cross Cultural Psychology	05/03/2013	
	RST 250: Studies in Humanities (CT)	Spring 2016	
	RST 300: The Nature of Religion		02/01/2013
	SOC 200: Introductory Sociology (CT)		
	SOC 200E: Introductory Sociology		
	Online (CT)		
	SOC 200H: Introductory Sociology		
	Honors (CT)		
	SOC 362: Health Culture and Society	Spring 2015	
	SOC 445: Social Statistics II		10/26/2012
	SPN 335: Latin American Culture and	02/24/2014	
	Civilization	00/04/05::	
	SPN 336: Spain: Culture and	02/24/2014	
	Civilization	00/04/0044	_
	SPN 436: Culture and Society in	02/24/2014	
	Contemporary Spain		
Science	CJ 406: Race, Ethnicity, Gender, and		
OCIGILOG	Crime		
	Oning		
Information	N/A		
Technology and	1.57.		
Engineering			
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International

Academic College	ollege Multicultural Course I		Review Date (Approval)
		Date	
Arts and Media	Arts and Media JMC 436: International Communications		12/12/2012
Business ECN 150: US in a Global Economy			
ECN 202: Introduction to African			
Economics			
	ECN 340: Global Macro Issues	09//22/2012	

		•	
	ECN 408: Comparative Economic	09//22/2012	
	Systems		
	ECN 420: International Trade	09//22/2012	
	ECN 421: Global Macroeconomic		
	Analysis		
	ECN 460: Economics of Developing	09//22/2012	
	Countries		
	FIN 440: International Finance	09//22/2012	
	FIN 475: International Business	12/12/2012	
	Strategies		
	MGT 445: International Management		10/26/2012
	MKT 371: International Marketing		10/26/2012
	MKT 371E: International Marketing		
	Online		
Education and	N/A		
Professional			
Development			
Health Professions	HP 400: Global Health	04/05/2013	
	PH 270: Global Health (CT)	Spring 2014	
Liberal Arts	ANT 201: Cultural Anthropology (CT)		
	ANT 201H: Cultural Anthropology		
	Honors (CT)		
	ANT 371: Linguistic Anthropology	11/15/2012	
	ANT 426: African Cultures		
	ANT 427: Ethnic Relations		
	ANT 437: World Cultures		
	ANT 440: African Cultures	Fall 2012	
	ANT 445: American Ethnicities	Fall 2016	
	ANT 465: Anthropology of Global		
	Problems		
	ENG 428: International Literature		12/12/2012
	FRN 240: French Society and Life		
	FRN 404: 20th Century French Novel		
	FRN 405: French Civilization and		
	Culture		
	FRN 406: French Civilization and		
	Culture		
	GEO 100: Introduction to Human		12/12/2012
	Geography (CT)		
	Geo 100E: Introduction to Human		12/12/2012
	Geography Online (CT)		10/10/0010
	GEO 203: Economic Geography (CT)	4.0./0.0./0.0.4.0	12/12/2012
	GEO 222: Global Environment Issues	10/22/2010	
	(CT)		
	GEO 302: Geography of Europe		40/40/0040
	GEO 305: Geography of North America		12/12/2012
	GEO 309: Geography of South America		
	GEO 314: Geography of the Middle		
	East		
	GEO 315: Geography of Africa and		
	Australia		42/42/2042
	GEO 317: World Geography Problems		12/12/2012
	GEO 317E: World Geography Problems Online		12/12/2012
			40/40/2040
	GEO 403: Geography of Asia		12/12/2012
	GEO 404: Geography of Europe		12/12/2012
	GEO 405: Political Geography	1	12/12/2012

10	GEO 406: Population Geography		12/12/2012
	GEO 408: Geography of Mexico		12/12/2012
	GEO 409: North Africa and Southwest		12/12/2012
	Asia		12/12/2012
	GEO 412: Geography of Russia and		12/12/2012
	CIS		
	GEO 422: Environmental Geography	Spring 2011	
	GER 240: German Society and Life	1 0	
	HST 103: The World Since 1850 (CT)		12/12/2012
	HST 103E: The World Since 1850		12/12/2012
	Online (CT)		
F	HST 103H: The World Since 1850		12/12/2012
H	Honors (CT)		
	HST 208: The Developing World (CT)		
F	HST 221: War in Modern Times		
H	HST 223: Rise and Fall of Nazi		12/12/2012
	Germany		
	HST 261: The Modern Middle East		
H	HST 301: Latin America: Discovery to		12/12/2012
	ndependence		
	HST 302: Latin America: Independence		12/12/2012
	o Present		
	HST 304: Spanish History since 1475		12/12/2012
	HST 307: The Global Cold War	02/17/2012	
	HST 361: The Modern Middle East		12/12/2012
	HST 377: China in the 20th Century		
	HST 378: Modern Asia		
	HST 423: US-Latin American Relations		
	HST 426: European History 1914-		
	Present		
	HST 428: Intellectual and Cultural		
	History of Modern Europe		
	HST 430: Soviet Russia		
	HST 434: American Experience in		
	/ietnam		
	HST 435: Modern Japan	44/45/0040	
	JPN 240: Japanese Culture	11/15/2012	
	JPN 245: Modern Japanese Literature	03/01/2013	
	CT)	03/01/2013	
	JPN 250: Japanese Anime and Manga	03/01/2013	
	CT)	11/15/2012	
	JPN 335: Japanese Society and Culture JPN 401: Readings in Advanced	11/15/2012	
	•	11/10/2012	
	Japanese I JPN 402: Readings in Advanced	11/15/2012	
	Japanese II	11/13/2012	
	JPN 408: Literature of Asians in the	Fall 2016	
	Americas	1 411 2010	
	JPN 409: Japanese Capstone	11/15/2012	
	PHL 320: Comparative Philosophy	11/10/2012	12/12/2012
	PSC 207: Comparative Politics (CT)		,,
	PSC 209: Fundamentals of International		02/01/2013
	Relations (CT)		32,01,2010
	PSC 309: Fundamentals of International		
	Relations		
	PSC 405: International Organizations		02/01/2013
	PSC 406: International Politics		02/01/2013
	PSC 407: Asian Politics		52.01,2010
	PSC 408: Middle Eastern Politics		02/01/2013
H	PSC 409: West Democratic Politics		02/01/2013
F	CO 700. WEST DEMOCIATION FUILLOS		02/01/2013

	PSC 410: European Communist Politics		02/01/2013
	PSC 411: Latin American Politics		02/01/2013
	PSC 415: International Law		02/01/2013
	PSC 416: Politics of Development		02/01/2013
	PSC 420: Current World/Regional		
	Issues		
	PSC 422: African Political Systems		
	PSC 423: American Foreign Policy		02/01/2013
	PSC 424: Comparative Foreign Policy		
	PSC 428: Islamic Political Ideas and		
	Institutions		
	PSC 429: Politics of Conflict and		02/01/2013
	Revolution		
	RST 205: Religious Traditions of the		
	West		
	RST 206: Religious Traditions of Asia		
	RST 303: World of Islam		12/12/2012
	RST 361: Buddhism		12/12/2012
	SOC 401: Population and Human		
	Ecology	44/45/0040	
	SPN 240: Spanish Society and Life	11/15/2012	
	SPN 402: Contemporary Latin		
	American Prose Fiction		
	SPN 403: 20 th Century Spanish Drama		
	SPN 405: Latin American Civilization I		
	SPN 406: Hispanic Civilization SPN 411: Pre-Modern Latin American		44/45/2042
	Literature		11/15/2012
	SPN 420: Afro-Latin America	10/26/2012	
	SPN 435: Contemporary Latin	Fall 2014	
	American Culture	Fall 2014	
	American Culture		
Science	N/A		
Information	SFT 235: Introduction to Safety (CT)		
Technology and	SFT 453: International Safety and		12/12/2012
Engineering	Health		
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Appendix XI

List of Writing across the Curriculum (WAC) Certified Instructors for the Period of the Review by Academic College and Certification Option

College	Faculty Member	Year Certified/Recertified	Option
СОВ	Kent (William) Willis	Fall 2012, Fall 2015	В
	Elizabeth Reusch	Spring 2012, Spring 2013	В
	Marc Sollosy	Fall 2013	В
	Uyi Lawani	Fall 2015	
COEPD	Laura Boswell	11/06, 2009, Fall 13	Α
	Thomas Klein	11/03, 2006, Spring 2010, Spring	Α
		2013	
	Mindy Allenger	Spring 2014	В
	Tina Cartwright	Fall 2009, Spring 2013	В
	Janet Dozier	Spring 2011, Spring 2014	В
CAM	Mary Grassell	08/95, 2001, 2003, Spring 2008,	Α
		Spring 2015	
	Heather Stark	Fall 2012, Spring 2014, Fall 2014	Α
	Maribea Barnes	12/09, Spring 2013	Α
	Ann Marie Bingham	10/97, 2002, 2004, 2008, Spring	Α
		2010, Spring 2013	
	Henning Vauth	Fall 2013	В
	Nicole Perrone	Spring 2014	Α
	Allyson Goodman	09/05, 2010, Spring 2011, Spring	Α
	, , , , , , , , , , , , , , , , , , , ,	2014	
	Christine Ingersoll	Fall 2011, Spring 2014	В
	Chuck Bailey	Spring 2013	В
CITE	Clair Roudebush	09/05, 2009, 2012, Fall 2014	Α
	Venkat Gudivada	Fall 2013	В
COLA	Charles Lloyd	08/22/95, 2000, 2003, 2014,	Α
		recertified permanently through	
		conference facilitation, Spring 2015	
	Caroline Perkins	08/22/95, 2001, 2003, 2006, 2009,	Α
		Spring 2013	
	E. Del Chrol	11/07, 2010, Spring 2012, Spring	Α
		2015	
	Susan Gilpin	11/12/99, 2007, Spring 2015	Α
	Barbara Tarter	11/07, 2012, Spring 2015	Α
	Stephen Underhill	Spring 2015	В
	Shirley Lumpkin	08/22/95, 2001, 2003, 2007, 2008,	Α
		recertified permanently through	
		conference facilitation	
	Mary Moore	10/10/97, 2002, 2006, Spring 2010,	Α
		Spring 2013	
	Kateryna Schray	11/06/98, 2000, 2003, 2006, 2008,	Α
		2011, Spring 2015	

John Young	11/09/01, 2003, Spring 2013	Α
Tim Burbery	11/08/02, 2004, 2007, Spring 2010,	A
	Spring 2013	
Gwyneth Hood	11/12/99, 2002, 2004, 2008, Spring	Α
	2011, Fall 2013	
Daniel O'Malley	Spring 2013, Spring 2014	Α
James Riemer	11/04, 2008, Spring 2011, Spring	Α
	2014	
Walter Squire	Spring 2011, Spring 2014	Α
Mary Welch	Spring 2011, Spring 2014	Α
Robert Ellison	Spring 2014	Α
Rachel Peckham	Fall 2014	В
Roxanne Aftanas	Spring 2012, Spring 2015	В
Allison Carey	Fall 2010, Spring 2014	В
Mallory Carpenter	Fall 2012, Spring 2015	В
Jeanne Hubbard	Fall 2012, Spring 2013	В
Kristen Lillvis	Fall 2012, Spring 2015	В
Joni Magnusson	Spring 2013	В
Carrie Oeding	Fall 2013	В
Kelli Prejean		В
David Robinson	Spring 2012	В
Anna Rollins	Spring 2013	В
	Spring 2013	В
Cat Staley Jill Treftz	Spring 2013	В
John Van Kirk	Spring 2012, Spring 2015	В
	Fall 2010, Spring 2014	
Sabrina Jones	Spring 2015	В
Anthony Viola	Spring 2012, Spring 2015	В
Britton Lumpkin	Spring 2015	В
Montserrat Miller	04/23/98, 2002, 2004, Spring 2008, Spring 2013	A
Greta Rensenbrink	04/09, Spring 2013	Α
William Palmer	11/09/01, 2003, 2008, Spring 2011,	Α
-	Spring 2013, Fall 2015	
Laura Michelle Diener	12/06/10, Spring 2014	Α
Michael Woods	Fall 2013, Fall 2014	Α
David Trowbridge	Spring 2015	В
James Leonard	12/06/10, Spring 2012, Spring 2013	A and B (Spring 2012 and 2013)
Josh Hagen	Spring 2014	B
Anita Walz	Fall 2012, Spring 2013	В
Zelideth Rivas	Fall 2012, Spring 2014	A
Cheryl Brown	11/12/99, 2002, 2004, Spring 2008,	A
	Fall 13	
Marybeth Beller	11/09/01, 2004, 2009, 2011, Spring	Α
	2015	
Jamie Warner	11/04, 2009, Spring 2013, Spring	Α
	2014	

	Damien Arthur	Spring 2015	В
	Bob Behrman	09/05, 2009, Spring 2014	A
	Shawn Schulenberg	Spring 2015	В
	April Fugett	12/09, recertified permanently	A
	, ip.ii. agai	through conference facilitation	7.
	Dawn Howerton	Fall 2012, Spring 2014	Α
	Penny Koontz	Fall 2012, Spring 2014, Fall 2014	A
	Paige Muellerleile	12/09, Spring 2013	A
	Melissa Atkins	Fall 2013, Spring 2015	В
	Keith Beard	Spring 2014, Spring 2015	В
	Chris LeGrow	Spring 2014, 5pring 2015	В
	Britani Black	Spring 2014	В
	Josh Carter	Spring 2014 Spring 2014	В
	Donna Sullivan	11/08, Fall 2012, Spring 2015	A
	Kristi Fondren	Fall 2012, Spring 2014, Fall 2014	A
	Jeremiah Wade Williamson	Fall 2013	В
	Brian Hoey	Fall 2013	В
	Abby Daniel		В
	Joel Peckham	Fall 2014 Fall 2014	В
	Ian Nolte		В
	Sarah Chavez	Fall 2014	В
	Kristin Steele	Fall 2014	В
СОНР	Susan Frank	Fall 2014	А
CORP	Susan Frank	11/04, 2008, Spring 2011, Spring	A
	Leanne Fortner	2014	В
		Fall 2010, Spring 2012	В
	Mary Kathryn Gould Jana Hovland	Spring 2013, Spring 2015	В
	Jana Hoviand	Spring 2013, Spring 2014, Spring	Б
	Gary McIlvain	2015	A
	Gary McIlvain	11/07/03, 2006, Spring 2011,	^
	Sandra Prunty	Spring 2014	A
	Joy Cline	2008, Spring 2011, Spring 2014 Spring 2012, Spring 2013, Spring	В
	July Cillie		٦
	Jo Dee Gottlieb	2014, Fall 2015 04/23/98, 2002, 2004, 2008, Spring	A
	SO DOC GOUNED	2011, Spring 2013	/ 1
	Shawn King	Spring 2012	В
	Rebecca Dondanville	Spring 2012 Spring 2013	В
	Liz Casey	Spring 2014	В
	Susan Welch	-13	В
	Deanna Pope		В
St. Mary's	Chris Trotter	Spring 2013	В
	Keith Terry	Spring 2013	В
222	Rita Fischer	Spring 2011, Spring 2013	В
cos	Marcia Harrison	08/22/95, 2002, 2004, 2007,	A
	<u> </u>	Spring 2014, Fall 2015	
	Andrew Gooding	04/06/01, 2003, 2006, 2008, Spring	A
		2013	

	Christopher Trotter		В
Unknown	Angela Lawrence	Fall 2014	В
		2014	
	Kimberly DeTardo-Bora	05/06, 2009, Spring 2013, Spring	Α
	Sam Dameron	11/08/02, 2004, 2009, Spring 2013	Α
		2010, Spring 2013	
	Margaret Brown	10/17/96, 2000, 2003, 2008, Spring	Α
	Howard Richards	Fall 2009, Spring 2013, Spring 2015	В
	Muhammad Amjad	Fall 2012, Spring 2013	В
	Laura McCunn-Jordan	2012, Spring 2015	Α
		2014	
	Anna Mummert	Spring 2012, Spring 2013, Spring	В
	Carl Mummert	Spring 2011, Spring 2014	Α
	Karen Mitchell	10/20/95, 2001, 2003, Fall 2013	Α
	Brian Day	Fall 2013	В
	David Graefe	Spring 2013	В
	Menashi Cohenford	Fall 2013	В
	Elizabeth Murray	Fall 2011, Spring 2014, Spring 2015	В
	Bill Gardner	Spring 2013, Spring 2014	В
		Fall 2014	
	John Sammons	12/06/10, Spring 2011, Fall 2012,	Α

Appendix XII

Capstone Experiences

College of Arts and Media

BFA - Bachelor of Fine Arts

Major: Music

The BFA with an emphasis in Composition or Theory both feature these course goals:

- 1. To present either a public recital of creative work, or a public presentation of theoretical research.
- 2. To research and write intelligently about creative work or research topic.
- 3. To compose a recital press release and a one-page professional resume.
- 4. To pass an oral examination on the genesis of recital works or research.

The BFA with an emphasis in Performance or Jazz Studies feature these course goals:

- 1. To perform an artistic and technically proficient public recital.
- 2. To research and write intelligently about the recital repertoire.
- 3. To compose a recital press release and a one-page professional resume.
- 4. To pass an oral examination on recital repertoire and research.

Major: Theatre

Each student develops a project that is appropriate to his/her emphasis area in consultation with the capstone committee. Projects may vary from directed plays to set designs, etc. The project must be thoroughly researched and the capstone course is completed a research paper and presentation of that research.

Major: Visual Art

Students in the Visual Art major of the BFA degree satisfy the capstone requirement with three components that utilize and showcase the creative and analytic skills that students have developed through their coursework. The components include 1) creative visual productions (the capstone project) produced in full or in part during the senior year; 2) a public presentation of the capstone project, typically in a gallery setting, and 3) a capstone statement.

BA - Journalism

Major: Advertising and Public Relations

Advertising and PR majors' capstone courses are built around a campaign project, one for a branded product the other for a local non-profit and generally with a fund raising emphasis. The students must generate original product and audience research, produce a media placement plan, create persuasive messages and samples of how the messages will be delivered in media—print

ads, news releases, blogs, corporate videos, etc., assemble the entire plan and samples into a plans book and present the campaign to the client.

Major: Journalism

Students in Print, Online, and Sports emphases must research a current ethical issue in the field, discuss pros and cons in a formal debate situation and write a 10-15 page paper on the subject.

Students in the Broadcast emphasis produce a 15-minute weekly news program that is broadcast statewide on public television stations, distributed on You Tube and webcast. Class members write shoot and edit news packages that are inserted into the program, serve as anchors, run floor cameras and staff the control room.

BA - The Arts

Major: Art History track

The Capstone project for students in the Art History track of the BA in the Arts, Art major described as a research project.

Major: Media Studies/Production

Students in the Radio/Television Production and Management emphasis must research a current ethical issue in the field, discuss pros and cons in a formal debate situation and write a 10-15 page paper on the subject.

Major: Music and Allied Arts

The capstone is a summative project tailored to each student's individual needs. Determined through consultation with the student's capstone committee members; the project may include a written research project, an internship with a summative written evaluation completed by the student, etc. Students may also be asked to submit a resume, press release, and other materials appropriate to their future needs. The course is completed with a presentation and oral exam.

Major: Video Production

Students in the Video Production major of the BA in the Arts degree conceive, plan and produce a culminating video project.

Major: Visual Art and Design track and Allied Arts

Students in the Visual Art and Design, and Allied Arts tracks of the BA Arts (Art) meet similar requirements as described above.

Major: Theatre and Allied Arts

Each student develops a project that is appropriate to his/her emphasis area in consultation with the capstone committee. Projects may vary from directed plays to set designs, etc. The project must be thoroughly researched and the capstone course is completed a research paper and presentation of that research.

Lewis College of Business

BBA – Accounting

ACC 499 Professional and Ethics Seminar: Students are expected to learn about the business and ethical context within which accountants operate, and in a culminating case demonstrate an understanding of accounting principles and how to apply them to business data, producing "fairly presented" financial statements which are explained to a mock board of directors. Students learn to address difficult situations and present compelling solutions in both oral and written form.

BBA - Economics

ECN 466 Economics Workshop: Students are expected to demonstrate understanding of fundamental principles of micro and macroeconomic analysis through applied research using economic data. Students will analyze, interpret and present findings of the research in a technically written paper and make an oral presentation.

BBA - Finance

FIN 470 Financial Policies and Strategies: Students are expected to demonstrate mastery of financial analytical techniques through case studies. The case studies involve teamwork and students are expected to learn how to work with others as a team in the preparation and presentation of professionally written quality reports.

BBA – International Business

FIN 475 International Business Strategies: Students are expected to have knowledge of financial, economic and business conditions outside the USA and demonstrate mastery of this knowledge through professionally written quality reports and presentations.

BBA – Management

MGT 460 Strategic Management: Strategic Management challenges the student to synthesize the entirety of their undergraduate business education experience. It does so by incorporating a variety of pedagogical techniques, including, but not limited to; case studies, simulations, oral and written presentations designed to highlight the students' critical thinking and analytical skills, and communication skills.

BBA – Management Information Systems

MIS 475 Strategic Management Information Systems: Students will engage in a semester-long project aimed at integrating the knowledge obtained through the MIS core coursework. The focus of the project will be the strategic management of enterprise and organization architecture and infrastructure and will culminate in the presentation of a strategic IS/IT plan.

BBA – Marketing

MKT 465 Marketing Management: In groups of three or four, students will create the framework for a marketable product, produce a website for it, utilize search engine optimization (SEO) techniques to promote the website, use content marketing to bring consumers to the website, and pen a publishable white paper (15-20 pages) designed to engage potential customers. At the end of the semester each group will present a comprehensive report of how their project evolved throughout the semester.

College of Education and Professional Development

BA – Elementary, BA – Secondary, and BA – Early Childhood Education

All students in the College of Education and Professional Development must complete a student teaching experience as their capstone project. The Level III Clinical Experience (student teaching) is a full day, full-semester experience in one or more public schools. Undergraduates receive 12 hours (CR/NC) for student teaching. The number of public schools in which teacher candidates are placed during this clinical is determined by the candidates' combination of teaching fields and grade levels. Teacher candidates who are assigned three five-week placements or one sixteenweek placement should consult the university supervisor for sequencing. Most teacher candidates will have two eight-week placements.

The purpose of this experience is to act as the final clinical experience and allows teacher candidates to:

- apply theories, research, and philosophies of education to the practice of teaching in a public school.
- refine planning, teaching, management, assessment, and reflection skills to achieve a level of professional competence consistent with the COEPD, CAEP, and state competency standards.
- critically examine teaching and learning processes and student learning as well as assume the full role of a teacher.
- use current technologies and strategies as well as enhance critical thinking and maximize learning.
- develop reflective and self-assessment skills as they continually analyze and evaluate their own progress.
- respond to issues of diversity, considering the needs of students individually as well as collectively.

College of Health Professions

BS – Athletic Training

Seniors majoring in Athletic Training must complete HS 490 (Internship) to fulfill their capstone requirement. The course description indicates that, during this course,

students will develop evaluation and treatment skills under the direction of a BOC-certified Athletic Trainer. To successfully complete this course, students must complete 225 clinical hours and score 70% or higher on a competency examination.

BS – Biomechanics

The capstone experience in Biomechanics is HS 475 (Trends in Biomechanics). During this course, students conduct a final investigation into normal and abnormal human movement patterns in sport, the workplace, and in activities of daily living. This course exposes students to the research process in the field of biomechanics.

Clinical Laboratory Science: BS – Medical Laboratory Science and BS – Cytotechnology

Students majoring in disciplines within the Department of Clinical Laboratory Science complete CLS 468 (Senior Research: Clinical Laboratory Independent Research Capstone). This course, for which students receive two hours credit, requires that each student design a clinical research project, develop a written research proposal, conduct the student and prepare a written report.

BS - Communication Disorders

The capstone experience in Communication Disorders is CD 415 (Professional Literacies for SLP's). This course requires students to write a capstone paper to go with a presentation. Both the paper and presentation are peer-reviewed at some point in the process. Research can be a literature review or a study they conduct. Students select their topic.

BS – Dietetics

For the Dietetics capstone, students do a community cooking class/nutrition presentation. They are responsible for all aspects and recruit participants from the community.

BS – Exercise Science

Students majoring in Exercise Science complete ESS 491 (Internship for Exercise Science) to complete their capstone requirements. Students are required to complete a minimum of 360 hours working at a health care or fitness related facility to receive six hours credit for this internship; some students complete 720 working hours and receive twelve hours of credit. During the internship, students must complete a cover letter, resume, and internship report. Additionally, students complete weekly reports and each student is evaluated by his or her internship supervisor.

BS - Health Science

Heath Science majors have a variety of options to complete their capstone experience. These options include (but are not limited to) job shadowing, internships, nonprofit work, specific projects, volunteer work, volunteer coaching, and health related jobs.

BS – Medical Imaging

The capstone course for Medical Imaging is MI 410 (Research in Medical Imaging). This course is a core requirement for all students regardless of the Advanced Practice Track. In this course, students use information literacy skills to engage in intellectual inquiry through the use of scholarly research methods. Research methods and information literacy are important because the health care profession is continually changing, which requires the radiologic technologist to possess new knowledge to function competently. The radiologic technologist should contribute to the body of knowledge and be able to effectively analyze resources to promote growth in the profession. The attitude of lifelong learning enables the radiologic technologist to stay in step with the current health care environment and be prepared to help foster the future and increase awareness of the profession in the global community.

BSN - Nursing

The BSN program has two tracks. The first is the pre-licensure BSN Program. Students enrolled in this program complete NUR 422, a practicum course. During this capstone experience, students complete 150 hours of clinical work, including 6 hours of interdisciplinary simulation. They also do a poster presentation of evidence-based research at either the Cabell Huntington Hospital Evidence-Based Practice Conference or at the College of Health Professions Research Day.

The second track is the RN to BSN program. Students enrolled in this program complete an Evidence-Based Practice proposal, a power point presentation of the proposal, a Mass media campaign for health promotion, a teaching module for chronic illness, a reflection paper on a current or previous nursing leader, a paper exploring current legal issues in nursing, and a presentation exploring ethical issues in nursing. Students also participate in discussion board threads throughout the semester.

BA - Physical Education

The capstone experience for students majoring in Physical Education (aka Sport Management) consists of completing ESS 475 (Seminar in Sport). According to its catalog description, the course is designed to provide students with an overview to all aspects involved in the Sport Management and Marketing field through classroom lectures, guest speakers, and field trips.

BPH - Public Health

For their capstone experience, students enrolled in BPH program are required to complete PH 490 - Public Health internship course, which requires 250 hours that can be completed in any agency/organization that provides on-the-job practical experience/s for BPH students. Students submit a measurable output (such as a mini-thesis, report flyer, documentation of fundraising, report of data analysis, etc.) as a part of their internship assignment. In addition to the final output, students also submit bi-weekly reports documenting their experiences and learning as a part of their participation in PH 490.

BS – Respiratory Care

Seniors majoring in Respiratory Care engage in a capstone experience that requires role synthesis and practicum during which they explore the roles of provider of care, coordinator of care, member of the Respiratory Care profession, and leadership roles within the profession.

BSW - Social Work

The research project for social work majors has been a thesis. Students conduct agency or community based research that could include survey research, interviews, focus groups, and/or analysis of existing data. Students go through the IRB process with the instructor serving as principal investigator. The capstone has, at times, been done in groups.

College of Liberal Arts

BA – Anthropology

Each senior majoring in Anthropology must complete an IRB approved research project under the direction of an Anthropology faculty member. Following completion of this project, each student must present the project and its findings at the College of Liberal Arts Research and Creativity Conference.

BA – Communication Studies

Seniors majoring in Communication Studies conduct original research in their area of emphasis (Interpersonal Organizational, Public, or Health Communication), write a research paper and present their findings to the Communication Studies faculty and students. They also present their findings at the College of Liberal Arts Research and Creativity Conference.

BA - Economics

The capstone project for the BA in Economics is the same as that for the BBA in Economics, which is explained in the section for the Lewis College of Business.

BA - English

Students enrolled in ENG 499, Senior Capstone, spend the semester working on two major projects: a 15-20 page research-based paper, and a 15-minute conference-style public presentation during final-exam week. According to guidelines adopted by the department in May 2015, the paper can be a work of "literary/critical analysis, pedagogy, or creative/critical hybrid" (in which students combine scholarly study and their own poetry, prose, video essay, and so on). Sample project titles from the 2015-16 academic year include

- * "Fading into the Green: An Ecofeminist Reading of Lars von Trier's Antichrist" (literary/critical analysis)
- * "Piecing it Together: Using Graphic Novels to Promote Literacy in the Classroom" (pedagogy)
- * "Dystopian Fiction: An Analysis of Adult Literature vs Young Adult Literature" (creative/critical hybrid)

BA – Foreign Languages (French, German, Japanese, and Spanish [modern] and Latin)

Each senior majoring in one of the modern languages (French, German, Japanese, or Spanish) must complete an independent research project that culminates in a written paper and an oral presentation in the target language. Japanese students also present their research in English at the College of Liberal Arts Research and Creativity Conference. Japanese and Spanish majors have designated capstone courses. French and German majors complete their capstone research as an extra project in a 400-level class.

Each senior majoring in Latin reworks a paper that s/he wrote in an upper division Latin class with two specific aims. First, the paper is expanded to approximately 25 to 30 pages in length, incorporates scholarship, and wrestles with some of the large ideas in the field. This experience gives students a pre-professionalization experience, helps prepare them for the rigors of graduate work, and produces a writing sample for graduate application. Second, the paper is revised again to make a conference length paper and students are required to deliver the paper in a public forum. The purpose of this is to inculcate the importance of participating within a scholarly community as well as communicating the ideas on the cutting edge of classical research.

BA/BS – Geography

Each senior majoring in Geography completes a capstone experience over the course of two semesters. During the first semester, the student completes a pilot research study and during the second the student expands this study into a more comprehensive research study that culminates in a presentation at a public conference, or, in the case of students completing the degree online, a presentation via the internet.

BA – History

The History capstone, HST 400, Senior Seminar, has as its major requirement a research paper the topic of which originates with the student (with consultation from the instructor and other relevant faculty members) and for which the student has to identify the relevant and useful literature and primary sources. The paper must contain sections outlining the hypothesis, the relevant literature, analysis of the primary sources, and a conclusion that includes historical significance (that is, the paper's contribution to the literature, not why it may or may not be an important topic).

BA – Humanities

The Humanities degree program integrates three humanities disciplines, Classics, Philosophy, and Religious Studies, and its capstone courses are interdisciplinary, teamtaught senior seminars, numbered from 490-494. The degree programs have a variety of these seminars because, in addition to being capstone courses, they are also options for the three required interdisciplinary courses that form the core of the Humanities degree program. For those majors taking them as capstone courses, we take up the interdisciplinary character of the course so that the senior student reflects, first, on the kinds of insights that can be achieved by combining the resources of the separate disciplines s/he has acquired in the single-discipline courses s/he has taken in the previous years of the major, and that s/he has had practice combining in the previous two interdisciplinary courses. Second, the reflection on the interaction among the disciplines also allows reflection on and appreciation of the kind of insight that each discipline uniquely offers, and with this a more developed sense of the nature of each discipline. These reflections are undertaken and assessed through a variety of possible media, depending on the content and focus of the specific course: for example, papers, journals, in-class discussions, and creative projects.

BA - International Affairs

Seniors majoring in International Affairs complete a term paper based on original research.

BA - Political Science

Each senior majoring in Political Science must complete a research paper and present this paper at the College of Liberal Arts Research and Creativity Conference. Students pick a research question of their choice (as long as it can be related back to the "political"), do an extensive scholarly literature review, and write a twenty page "original" argument using the theory, language and methods of Political Science.

BA - Psychology

Students earning a BA in Psychology have several options to complete their capstone projects. These options include:

- Complete PSY 456 (Research in Psychology) Students who choose this option
 work with an individual faculty member on the faculty member's research program.
 Students actively participate in the design of a specific research project, in the
 collection and analysis of data, and the students writes up the project's outcomes.
 Students typically present the study's results at the Psychology Tri-State Conference
 or at the College of Liberal Arts Research and Creativity Conference.
- Complete PSY 499 (Capstone Seminar) Students who choose this option must complete a group project, write a paper, and do an oral presentation as part of the course.
- Complete PSY 460 (History and Systems) This course presents the history and theories of psychology. Students must complete a paper and an oral presentation as part of the course.
- Complete a clinical or industrial/organizational practicum Students who choose this
 option are placed within a community agency and allowed to shadow individuals who
 work in the mental health or industrial/organizational field. They share their
 experiences in a group format, journal about their experiences in a written product,
 and do a final presentation related to their experience.

BA - Sociology

Each senior majoring in Sociology must complete an IRB approved research project under the direction of a Sociology faculty member. Following completion of this project, each student must present the project and its findings at the College of Liberal Arts Research and Creativity Conference.

College of Science

BS – Biology

The Biology Capstone (BSC 491) has a couple of options. (1) The most common route taken by our students is "professional" shadowing. It is up to the individual student to arrange a shadowing experience with a mentor. These shadowing experiences have

been with physicians, dentists, veterinarians, physical therapists, and even with scientists from the Corps of Engineers. The experience must include 90 hours of "work" as determined by the mentor and student. We are very particular that the student derive some academic and career benefit from the experience. We do not want the student to merely be free labor for the professional. With each proposal submitted by the student through our online system, the mentor must read, agree to and sign our Mentor's agreement form. This form becomes part of the student's record (in BSC office only). Following the shadowing experience, the mentor must complete sign and submit the Mentor's Evaluation form on which they score the student's performance in several areas, provide a comment of the number of hours actually worked and submit a score (out of 50 possible points) for that student. Some mentors will require a paper and/or presentation by the student at the conclusion of the experience. We allow these 2 extra steps as optional events. Students are required to submit to the BSC office summary papers describing their experiences with reflections of how these experiences have affected their opinions of the "job" as a potential career. These papers are usually 3-5 pages in length. The final grade for the shadowing experience is determined by the BSC faculty member in charge of the "course", but usually follows the recommendation of the mentor. (2) The next option for the BSC student is a research experience. These research projects can be carried out with BSC faculty or other non-BSC researchers providing the researcher is approved by the BSC faculty member in charge of the course. As with the shadowing path, the research students must submit their proposals through the online system for approval. Once the project is approved, the responsibility for mentoring and final grading of the project is turned over to the mentor. Most of the projects require at least 90 hours of work and often result in some final paper and/or oral presentation. It is my opinion that this is the most valuable option for the BSC students who wish to proceed into research as a career. (3) Lastly, we have, on occasion, had a Capstone class where a group of students meet regularly with a faculty member who directs their study of a particular subtopic. These classes have included lectures, student group projects and student presentations. The students who opted for this path were not required to submit a proposal and the faculty member in charge of that section had sole responsibility for the content and the students' final grades.

BS – Chemistry

In Chemistry, nearly all students complete either a research experience or industry based internship. Occasionally, one will do a pharmacy internship. Step one is that students take CHM 305 Research Methods in Chemistry. This course requires students to select their Capstone advisor, then write and present an original research proposal. We also spend a significant amount of time on ethics. A few other topics, such as laboratory notebooks and searching the literature are covered. The next course CHM 491 is the actual Capstone course. Those students doing research will work on the proposal with their selected advisor. Those doing an internship will work on a project that was approved by the department chair. It must be chemistry based and almost always requires hands-on experience. Finally, students take CHM 432 – Seminar. Each student attends a number of seminars presented by outside chemists (usually by faculty at programs recruiting graduate students) and their peers. All

students write a minimum 10 page senior thesis based on their research or internship. Most students will do a 10-15 minute presentation on the results of their projects, but a handful will present at a national or regional professional meeting (e.g. American Chemical Society) to fulfill the presentation requirement.

BA – Criminal Justice and Criminology

Prior to the Open Pathways initiative, the criminal justice and criminology program housed the capstone experience in the course, CJ 404: Theoretical Criminology. Over the academic years 2010-2014, a total of 299 criminal justice majors completed the course. For the capstone paper that was embedded into the course, students wrote about a famous criminal and described and applied theoretical foundations to the criminal's behavior. Alternatively, students could choose to write about a type of crime instead (i.e., arson, larceny, homicide, mass murder, child neglect, drug abuse, etc.) and how it could be explained with a criminological theory. With the introduction of the Lumina Project and Open Pathways initiative, criminal justice faculty revised the curriculum and CJ 492: Senior Seminar was offered for the first time to our majors as a standalone capstone course during the 2014-2015 academic year. Over that same time period, 56 majors have completed the course (CJ 404 no longer houses the capstone project). Students are responsible for producing their own original work and are informed that the capstone paper serves as the epitome of what they have learned as a criminal justice and criminology major that combines a demonstration of technological skills, data interpretation skills, and research skills, as well as their ability to develop and critically evaluate policy decisions. Students are expected to adhere to the APA Publication Manual for all citations and referencing. The product also serves as a writing sample that can be used for a job application or graduate/law school. The capstone experience is coupled with a formal classroom presentation.

Over the past five years, twenty-five students have gone beyond the classroom and presented their work at West Virginia Criminal Justice Educators' Association annual state conference. In addition, five students have placed either first, second, or third, in the undergraduate paper competition, which is also held at the conference (winning papers are published in the state journal). A sample of paper presentation topics are provided, which demonstrate the rigor and critical thinking that is employed in the major. Some examples are: "Juvenile Offenses: Stigmas Facing Urban Youth;" "Art Crime: A Rational Choice Theory Analysis;" "The Mind of Ted Bundy: An Evaluation Using Eysenck and Gudjonsson's Theory of Crime and Personality;" "An Explanation of Osama bin Laden's Acts of Terrorism Using Cohen and Felson's (1979) Routine Activities Theory;" and "Examining Aggressive Driving Through Displaced Aggression Theory."

BS - Digital Forensics

Seniors in the Digital Forensics Degree program complete a series of realistic practical exercises through which they demonstrate their ability to apply core digital forensic and information assurance knowledge and skills.

BS - Environmental Science

Seniors in the Environmental Science degree program demonstrate their synthesis of coursework and academic experience by designing and implementing capstone research projects or they actively engage in their fields through internships.

BS/BA - Geology

The purpose of the geology capstone (GLY 491/492, 2-4 credit hours) at Marshall is to give students experience doing research or project-related work, or gain additional experience in Field mapping/ work. Geology majors may fulfill the capstone requirement in one of three ways: (i) senior research based thesis, (ii) internship, and (iii) summer field camp. In the case of a research based thesis, the student is required to submit a proposal detailing the aspects of his/her research to be approved by the department in the semester preceding the one in which research is to be carried out. At the conclusion of his/her research project, the student submits a paper (12 to 15 pages of double spaced text + figures + tables + references... etc.). The student must then give an oral presentation with visual aids that is open to the public, summarizing the methods, results, and interpretations of his/her research. In the case of an internship, the student submits a report (8 pages of double spaced text + figures + tables + references... etc.) that should include general description of duties during internship and rigorous presentation, analysis, and interpretation of data from at least one example project in which he/she was involved. Guidelines for writing the paper/ report, and presenting to the public are provided at http://www.marshall.edu/geology/capstone/glyreg2015.pdf. In the case of a summer field camp, the student registers for a class offered by another accredited University (and lasting a minimum of 8 weeks) after obtaining the approval of Geology faculty at Marshall. Upon his/her return from field camp, the student then delivers an oral presentation open to the public outlining his/her experience, and showcasing maps that he/she prepared. Grading of the capstone class is based on criteria and rubrics detailed at

http://www.marshall.edu/geology/capstone/glyreq2015.pdf.

In the past 5 years, 29 students have registered for GLY 491/492. 68% of all students have chosen the internship option, where their employer input accounts for 50% of the grade. 18% have opted for a research based senior thesis under the supervision of one of the Geology faculty at Marshall, and 14% have chosen a Field camp, where the letter grade is assigned by their instructor. Feedback from employers or field camp instructors has shown our students to be among the best in the field/ companies.

BS – Integrated Science and Technology

Since its inception, IST has required a 2-course sequence for its capstone requirement. Although this has slightly changed by adding options over time, IST currently requires all students to take IST 490, Senior Project I, and then they take IST 491 (Senior Project II) or IST 470 (Internship). All IST 470 and IST 491 students present their work, whether be a project, or what they do while an intern, on the Wednesday of Finals Week. If students choose IST 491, they must come up with either

an individual or team-based project to complete and find a faculty member who will "sponsor" or work with them on the project. Internships require a minimum of 90 hours of work to be completed in a position either on campus or off-campus, but one that must be in their field of study.

BS - Mathematics

Students pursuing a Math, Applied Math, or Statistics major have several options to meet their capstone requirement. The most common choice is by taking MTH 491 – Senior Seminar. While taking Senior Seminar students choose a research mentor and work with them on an independent research project over the course of a semester. The project culminates in a paper and a public poster session. While topics vary widely based on student interest and mentor expertise, all capstone projects must contain at least one mathematical theorem and a proof based on the student's understanding. It is not expected that students create new mathematics at this level, so most projects are expository, though some do include original research.

Students who prefer to intern in industry or at a government lab can get capstone credit by taking MTH 490 – Internship and writing a paper based on the mathematics/statistics used in their internship. Students in MTH 490 also participate in the poster session. This option requires the employer's agreement and classified internships are not eligible.

The final option for students to acquire capstone credit in the mathematics department is to participate in the PIC Math project. These are projects that are done in small groups (3-5 students) and an industry partner. Students write technical reports for their industry partner and produce a poster to present in the poster session.

Learning Outcomes for MTH 491/490:

- Students will improve written and oral communication skills with respect to mathematics.
- Students will improve ability to reason rigorously in mathematical arguments.
- Students will develop ability to undertake independent work.
- Students will advance their level of critical sophistication.
- Students will gain perspective on interplay of applications, problem-solving, and theory.
- Students will conduct research and make oral and written presentations on various topics.

BS - Natural Resources and Recreation Management

The Natural Resources and Recreation Management (NRRM) Program at the College of Science offers *PLS* (*NRRM*) 490: Natural Resources and Recreation Internship. Since the academic year 2010 – 2011, a total of 49 NRRM majors completed this capstone requirement. The internship generally consists of a supervised, 40-hour per week position with an established agency focused on the management of natural

resources and outdoor recreation. All students in this course must complete a minimum of 240 hours of work with such an agency (i.e., a six-week full-time commitment). The internship is designed to provide students with an exceptional learning experience which is also a simulated work experience. By experiencing a wide variety of agency programs and responsibilities, the course serves as an excellent opportunity to assess students' strengths and weaknesses as a professional employee in the field of natural resources and recreation management. Additionally, the course provides students with an opportunity to work with other resource management professionals and to be evaluated by these professionals. As well as regularly scheduled work hours designed by the agencies, the internship requires weekly reports, a comprehensive manual, an individualized special project, an agency evaluation, and a formal presentation. Particularly, students are expected to prepare and present their special project results to the agency supervisor and other interested agency personnel. Examples of the special projects include mapping recreational facilities/infrastructure or inventorying natural resources using modern technologies (GPS/GIS), development of recreational or interpretive programming, research activities focused on natural resource and recreation management (e.g., visitor surveys, natural resource assessment and monitoring, etc.), web development or computer programming, literature review and synthesis to further understand specific management problems, etc. This requirement of the internship is also well aligned with the learning objectives/outcomes of the NRRM program, which focus on the human dimensions of natural resource management, geospatial technology, and experiential learning to promote a more in-depth and realworld understanding. In addition, upon completion of the internship, students are required to deliver a formal seminar presentation related to his/her internship experience and the agency. NRRM faculty members, internship students, other NRRM majors, and agency personnel typically attend these seminar presentations. A few examples of internship hosting agencies/locations include Beech Fort State Park (WV), Carter Caves State Resort Park (KY), Coal River Group (WV), North Bend State Park (WV), The Blue Ridge Mountains Council (BSA), WV Division of Natural Resources, etc.

BS – Physics

With the approval of the chair and in consultation with a supervising faculty member, students conduct an original research/engineering project of their own design. Research may be a continuation of a project begun earlier in the student's career. Students present the results of their project in an open forum, usually consisting of faculty members and other students, and prepare a formal paper reporting on their work.

College of Information Technology and Engineering

BS – Computer Science

The capstone course for Computer Science is CS 490 (Senior Project). This project can be an individual or team research project with a presentation.

BSE - Engineering

The capstone course for Engineering is ENGR 453 (Senior Capstone Design II). This is a team research project with a presentation and is completed by students completing all of the possible majors within Engineering.

BS – Safety Technology

The capstone course for Safety Technology is SFT 490 (Safety Internship). Students complete an internship to fulfill the capstone requirement for the BS in Safety Technology degree.

Appendix XIII Persistence and Graduation Rates

Persistence from Freshman to Sophomore Year for Students Entering Marshall from Fall 2005 through Fall 2014.

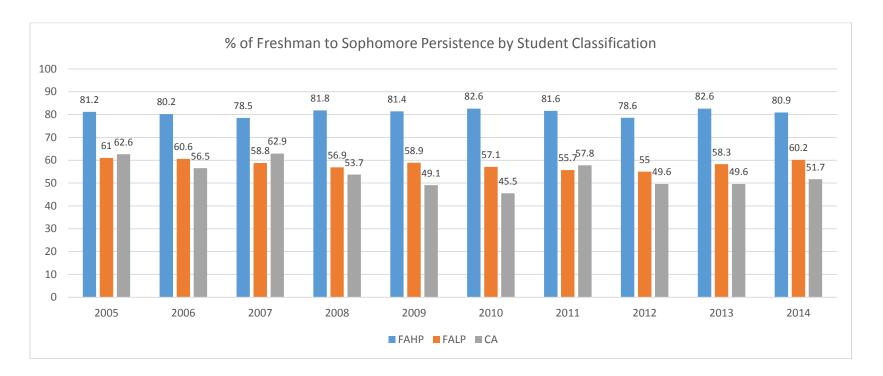
Entering Semester	Returning Semester	Retention Percentage	4-Year Graduation Rate	6-Year Graduation Rate
		-		
Fall 2005	Fall 2006	72.6%	19.9%	42.7%
Fall 2006	Fall 2007	70.7%	21.6%	42.1%
Fall 2007	Fall 2008	70.1%	22.2%	43.1%
Fall 2008	Fall 2009	70.4%	23.8%	43.4%
Fall 2009	Fall 2010	70.2%	23.6%	44.2%
Fall 2010	Fall 2011	69.9%	25.5%	
Fall 2011	Fall 2012	71.1%	28.7%	
Fall 2012	Fall 2013	68.3%	25.4%	
Fall 2013	Fall 2014	72.3%		
Fall 2014	Fall 2015	73.1%		

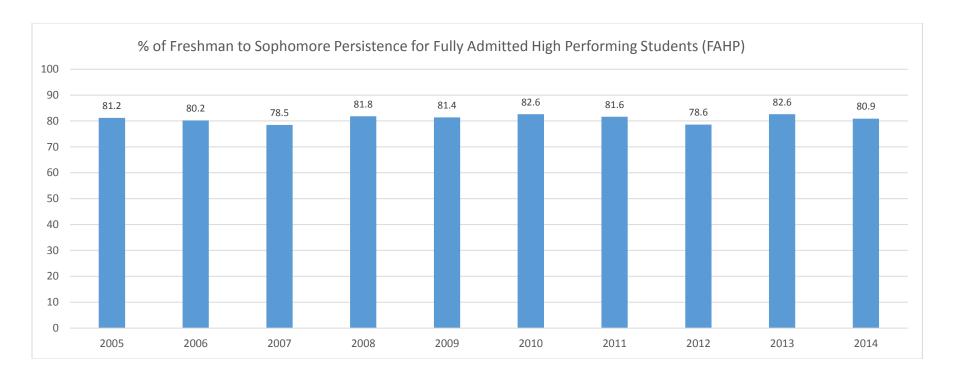
Note: Table Excludes Transition Program Students

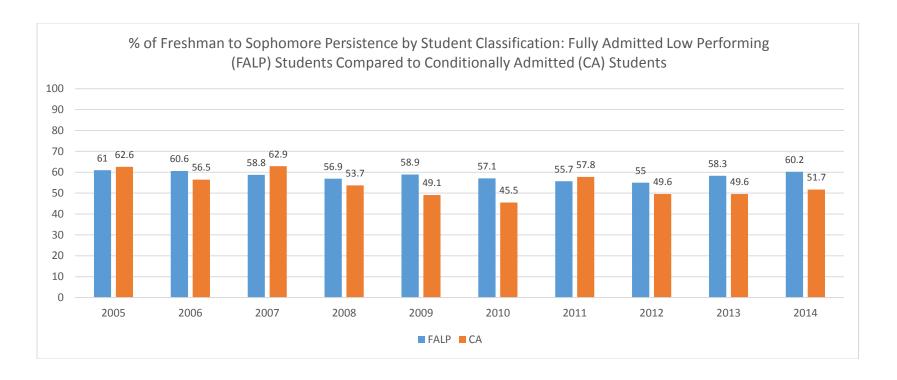
Persistence of Each Class by Student Classification

FAHP = fully admitted high performing (freshmen with high school GPA \geq 3.25) FALP = fully admitted low performing (freshmen with high school GPA < 3.25)

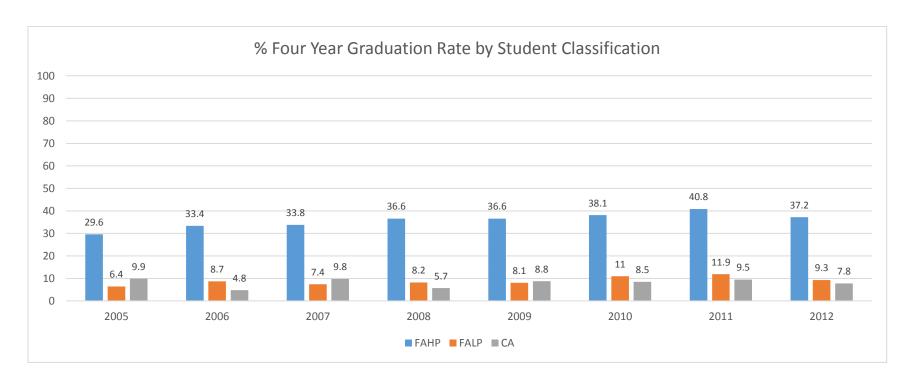
CA = students admitted to Marshall conditionally



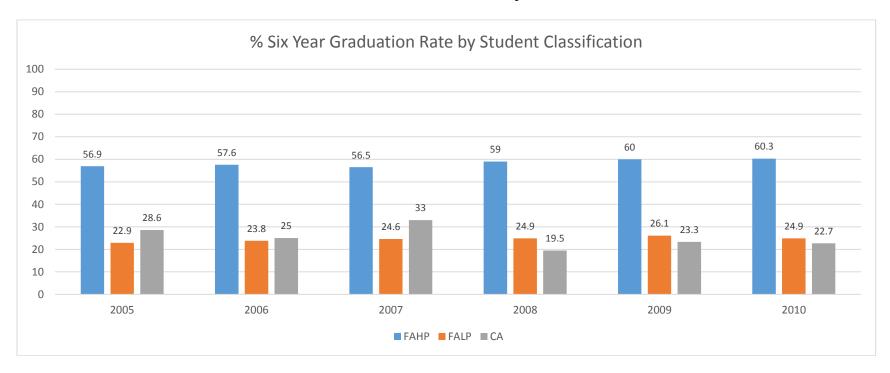




Four-Year Graduation Rate of Each Class by Student Classification



Six-Year Graduation Rate of Each Class by Student Classification



Note: Graphs Exclude Transition Program Students

Appendix XIV

Entrance Abilities of Freshmen Seeking Four-Year Degrees Admitted to Marshall University during the Review Period, with four-year graduation rates and College GPA at time of Graduation

Students Admitted Under Marshall Plan

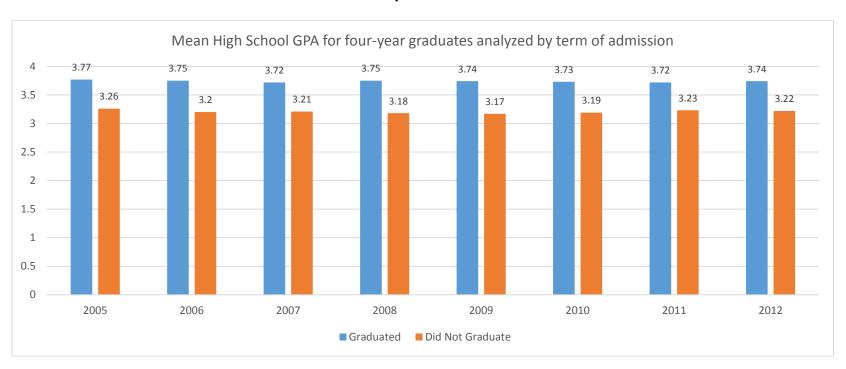
Term Enrolled	Admission Type	Graduated in 4 Years	Count (n)	High School GPA	Mean College GPA at Graduation	Mean Composite ACT	Mean English ACT	Mean Math ACT	Mean Reading ACT	Mean Science ACT
Fall 2005	CA	No	175	2.79	N/A	17.55	17.37	17.11	17.85	18.82
		Yes	19	3.17	2.96	16.82	16.76	17.47	16.47	18.18
	FAHP	No	682	3.70	N/A	23.20	24.15	21.95	24.65	23.25
		Yes	288	3.90	3.53	24.73	25.79	23.76	26.37	24.35
	FALP	No	488	2.80	N/A	20.79	21.04	19.09	22.28	21.23
		Yes	32	2.92	3.08	20.96	20.16	20.84	22.24	21.48
	Unknown	No	31	Unknown	N/A	21.54	22.08	17.46	24.79	21.71
		Yes	3	Unknown	3.9	20.50	21.50	14.00	25.50	20.00
Fall 2006	CA	No	149	2.76	N/A	17.65	17.74	16.93	17.89	18.69
		Yes	5	3.24	3.08	15.75	16.75	15.50	16.00	16.25
	FAHP	No	560	3.69	N/A	23.23	24.23	21.87	24.84	23.17
		Yes	282	3.90	3.55	25.13	26.51	24.17	26.45	24.68
	FALP	No	470	2.76	N/A	20.65	20.97	19.14	21.90	21.11
		Yes	46	2.86	3.13	21.34	21.34	20.66	22.38	21.69
	Unknown	No	34	Unknown	N/A	21.78	21.83	19.17	24.28	22.33
		Yes	3	Unknown	3.36	23.50	25.50	23.00	27.50	23.50
Fall 2007	CA	No	160	2.85	N/A	17.61	17.80	17.09	17.71	18.49
		Yes	14	2.86	2.90	16.67	17.58	15.58	17.83	17.42
	FAHP	No	616	3.67	N/A	23.28	24.24	21.92	24.60	23.27
		Yes	318	3.87	3.51	24.93	26.11	23.77	26.67	24.52
	FALP	No	499	2.75	N/A	21.12	21.37	19.36	22.98	21.27
		Yes	42	2.86	3.07	20.86	21.31	19.08	22.06	21.28
	Unknown	No	36	Unknown	N/A	19.82	19.45	17.59	21.91	20.00
		Yes	3	Unknown	3.30	14.33	14.33	14.00	13.67	14.67

Fall 2008	CA	No	111	2.48	N/A	17.83	17.94	17.07	18.52	18.54
		Yes	6	2.80	2.76	14.33	10.67	14.33	16.33	16.67
	FAHP	No	591	3.67	N/A	22.82	23.41	21.73	24.25	23.04
		Yes	345	3.89	3.52	24.96	26.03	23.91	26.56	24.77
	FALP	No	542	2.80	N/A	20.94	21.14	19.47	22.59	21.15
		Yes	51	2.94	3.10	21.30	21.19	20.53	22.79	21.56
	Unknown	No	39	Unknown	N/A	19.65	19.61	17.87	21.52	50.13
		Yes	2	Unknown	3.43	19.00	19.50	20.00	19.00	18.00
Fall 2009	CA	No	141	2.45	N/A	17.58	17.06	16.98	18.21	18.49
		Yes	11	2.88	2.78	16.63	16.13	17.38	18.00	16.63
	FAHP	No	647	3.70	N/A	23.13	23.90	21.93	24.68	23.16
		Yes	373	3.88	3.49	24.52	25.71	23.30	26.03	24.30
	FALP	No	602	2.78	N/A	20.70	20.87	19.11	22.23	21.13
		Yes	55	2.94	2.99	21.05	20.70	20.98	22.07	21.34
	Unknown	No	49	Unknown	N/A	21.93	21.68	19.36	24.07	22.50
		Yes	5	Unknown	3.02	22.00	21.33	20.33	20.67	22.00

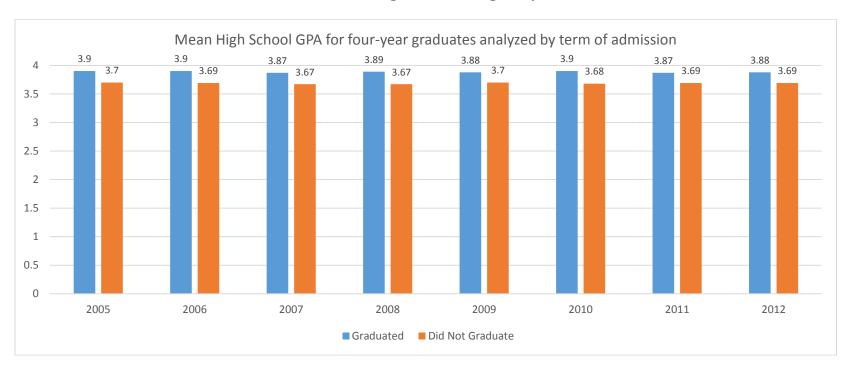
Students Admitted Under the Core Curriculum

Term	Admission	Graduated	Count	High	Mean	Mean	Mean	Mean	Mean	Mean
Enrolled	Туре	in 4 Years	(n)	School GPA	College GPA at	Composite ACT	English ACT	Math ACT	Reading ACT	Science ACT
				0.7.	Graduation	7.01	7.01	1.01	7.0.	/
Fall 2010	CA	No	157	2.56	N/A	16.98	16.65	16.27	17.78	17.87
		Yes	13	2.53	2.85	16.00	15.13	16.75	16.50	16.63
	FAHP	No	656	3.68	N/A	22.77	23.57	21.57	24.05	22.92
		Yes	403	3.90	3.48	24.83	25.70	23.80	26.50	24.72
	FALP	No	581	2.80	N/A	20.86	21.10	19.22	22.53	21.17
		Yes	70	2.95	3.11	21.03	21.64	19.59	22.12	21.17
	Unknown	No	60	Unknown	N/A	21.85	22.56	19.79	23.87	21.72
		Yes	11	Unknown	3.38	21.11	21.33	20.22	21.89	21.22
Fall 2011	CA	No	133	2.54	N/A	17.65	17.31	16.78	18.52	18.58
		Yes	14	2.62	2.63	16.64	15.45	16.73	17.18	18.45
	FAHP	No	697	3.69	N/A	22.71	23.46	21.47	24.16	22.93
		Yes	480	3.87	3.48	24.29	25.27	23.11	26.03	24.16
	FALP	No	559	2.83	N/A	20.68	20.86	19.36	21.99	21.08
		Yes	74	2.92	3.07	20.71	21.30	19.80	21.75	21.13
	Unknown	No	39	Unknown	N/A	21.15	20.70	19.05	22.95	22.10
		Yes	7	Unknown	3.36	20.33	20.67	18.33	21.33	21.33
Fall 2012	CA	No	130	2.53	N/A	17.22	16.68	16.49	18.27	18.07
		Yes	11	2.50	3.21	16.75	16.25	15.75	16.75	18.75
	FAHP	No	690	3.69	N/A	22.78	23.44	21.72	24.04	23.01
		Yes	421	3.88	3.53	24.19	25.37	23.05	25.67	23.96
	FALP	No	534	2.79	N/A	20.87	21.04	19.45	22.25	21.22
		Yes	62	3.00	3.18	20.53	21.22	18.92	21.76	20.64
	Unknown	No	54	Unknown	N/A	20.40	20.72	18.56	21.68	21.12
		Yes	6	Unknown	3.51	25.00	26.20	23.80	25.80	24.80

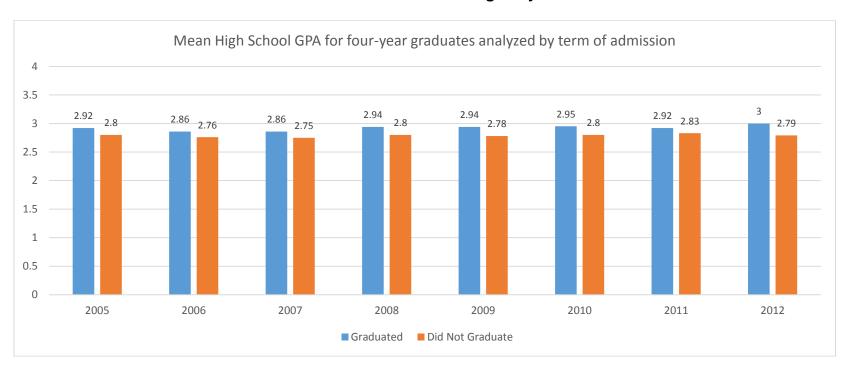
Comparison of High School GPA between Students Who Graduate in Four Years and Students Who Do Not Graduate in Four Years Collapsed Across Student Classifications



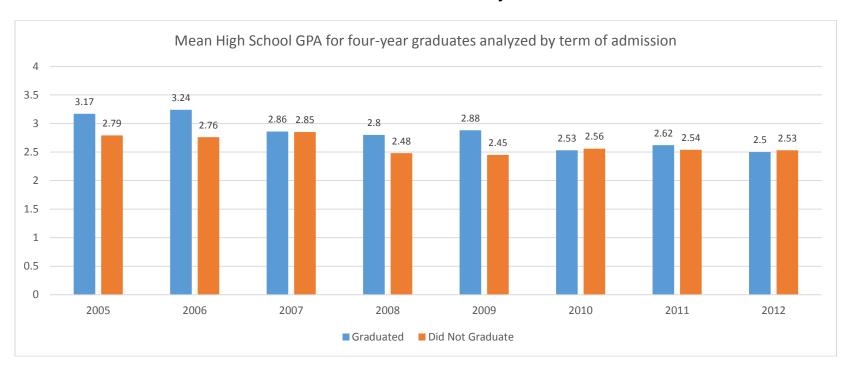
Comparison of High School GPA between Students Who Graduated in Four Years and Students Who Do Not Graduate in Four Years for High Performing Fully Admitted Students



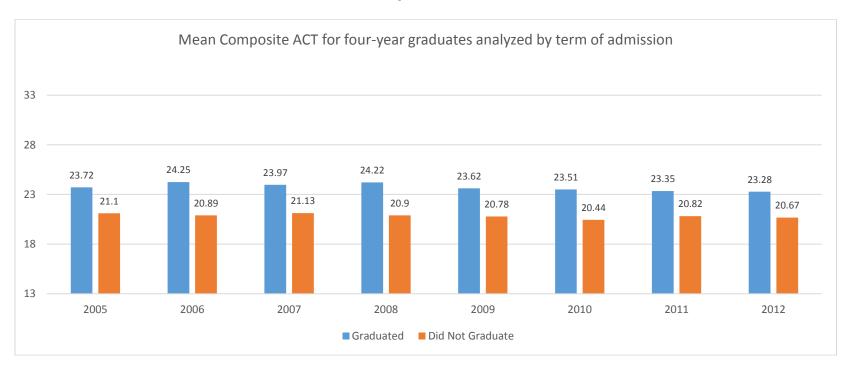
Comparison of High School GPA between Students Who Graduated in Four Years and Students Who Do Not Graduate in Four Years for Low Performing Fully Admitted Students



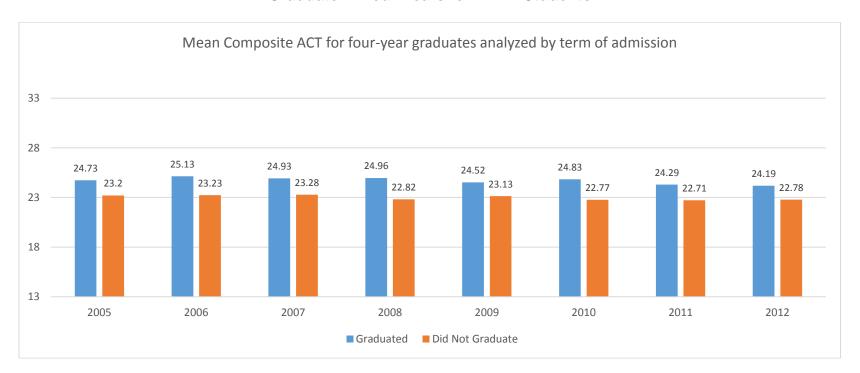
Comparison of High School GPA between Students Who Graduated in Four Years and Students Who Do Not Graduate in Four Years for Conditionally Admitted Students



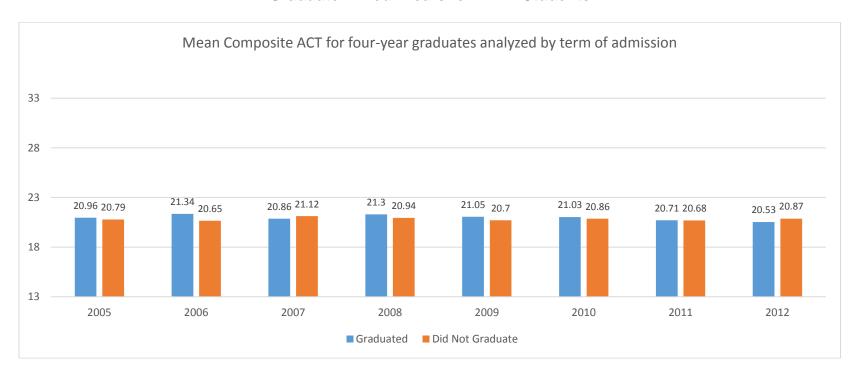
Comparison of Mean Composite ACT between Students Who Graduate in Four Years and Students Who Do Not Graduate in Four Years Collapsed Across Student Classifications



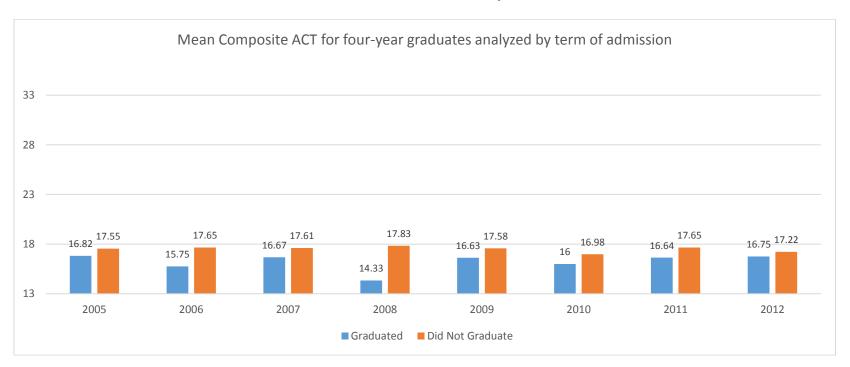
Comparison of Mean Composite ACT between Students Who Graduate in Four Years and Students Who Do Not Graduate in Four Years for FAHP Students



Comparison of Mean Composite ACT between Students Who Graduate in Four Years and Students Who Do Not Graduate in Four Years for FALP Students



Comparison of Mean Composite ACT between Students Who Graduate in Four Years and Students Who Do Not Graduate in Four Years for Conditionally Admitted Students



Appendix XV

2014 Degree Program Survey (which included Core Curriculum)

t hours you will h	ave complete	91 - 105 106 - 120 120 -	<u>sitv</u> by the en	d of this semester.	
		91 - 105 106 - 120			
		O 106 - 120			
		0			
ou have not taken	any Core Ci				
)	Neither Agree nor			
Strongly Agree	Agree	Disagree	Disagree	Strongly Disagree	Not Applicable
0	0	0	0	0	0
0	0	0	0	0	0
0	0	0	0	0	0
0	0	0	0	0	0
Strongly Agree	Agree	Neither Agree nor Disagree	Disagree	Strongly Disagree	Not Applicable
0	0	0	0	0	0
0	0	0	0	0	0
0	0	0	0	0	0
	0	0	0	0	0
		Neither Agree nor			
Strongly Agree	Agree	Disagree	Disagree	Strongly Disagree	Not Applicable
	0	0	0	0	0
0	0	0	0	0	0
0	0	0	0	0	0
0	0	0	0	0	0
	Strongly Agree	sur have not taken any Core Cinave helped me to Strongly Agree Agree Strongly Agree Agree Strongly Agree Agree Strongly Agree Agree	sur have not taken any Core Curriculum (general editor) Strongly Agree Agree Neither Agree nor Disagree Strongly Agree Agree Neither Agree nor Disagree Strongly Agree Agree Neither Agree nor Disagree Neither Agree nor Disagree Neither Agree nor Disagree Neither Agree nor Disagree	Strongly Agree Agree Disagree Disagree Strongly Agree Agree Neither Agree nor Disagree Strongly Agree Agree Disagree Disagree Neither Agree nor Disagree Neither Agree nor Disagree Neither Agree nor Disagree Neither Agree nor Disagree Disagree Disagree Disagree Disagree	Strongly Agree Agree Disagree Disagree Strongly Disagree Neither Agree nor Disagree Strongly Disagree Strongly Agree Agree Disagree Strongly Disagree

Find scholarly information, to evaluate it critically and to use it effectively.	0	0	0	0	0	0
Develop the ability to express myself effectively through speaking.	0	0	0	0	0	0
Develop multioultural and global perspectives.	0	0	0	0	0	0
	Strongly Agree	Agree N	leither Agree nor Disagree	Disagree	Strongly Disagree	Not Applicable
Analyze and evaluate issues and solve real-world problems in a manner that is ethical and supportive of our civio well-being.	0	0	0	0	0	0
Broaden my appreciation of the arts.	0	0	0	0	0	0
Examine issues from multiple perspectives.	0	0	0	0	0	0
Use what I know to solve novel problems.	0	0	0	0	0	0
Assess my own values and examine other viewpoints and oredible evidence.	0	0	0	0	0	0
	Strongly Agree	Agree h	leither Agree nor Disagree	Disagree	Strongly Disagree	Not Applicable
Determine how to improve my own learning and to engage in lifelong learning.	0	0	0	0	0	0
Gain experience in the use of technology important in my major field.	0	0	0	0	0	0
Use knowledge from more than one area of study to explore issues or solve problems.	0	0	0	0	0	0
Please indicate your level of satisf	faction with the qua	lity of the follow	ring aspects of vo	our Degree Pro	gram/Major.	
Please indicate your level of satisf	faction with the qua	lity of the follow Satisfied	ring aspects of yo			Very Dissatisfied
Please indicate your level of satisf		-		tral		Very Dissatisfied
	Very Satisfied	Satisfied	Neut	tral	Dissatisfied	•
Teaching Advising Aoademio Support Services	Very Satisfied	Satisfied	Neut	tral	Dissatisfied	0
Teaching Advising	Very Satisfied	Satisfied	Neut C	tral	Dissatisfied	0
Teaching Advising Academic Support Services Classroom/Lab Facilities	Very Satisfied	Satisfied O O O	Neut	tral	Dissatisfied O O	0
Teaching Advising Academic Support Services	Very Satisfied	Satisfied O O O	Neut	tral	Dissatisfied O O	0
Teaching Advising Academic Support Services Classroom/Lab Facilities	Very Satisfied	Satisfied O O O	Neut	tral	Dissatisfied O O	0
Teaching Advising Academic Support Services Classroom/Lab Facilities	Very Satisfied	Satisfied O O O	Neut	tral	Dissatisfied O O	0
Teaching Advising Academic Support Services Classroom/Lab Facilities Please provide examples of practic	Very Satisfied O O O O O O O O O O O O O O O O O O	Satisfied O O O O O O O O O	Neut G G G e resulted in dec	ep learning.	Dissatisfied O O	0
Teaching Advising Aoademio Support Services Classroom/Lab Facilities	Very Satisfied O O O O O O O O O O O O O O O O O O	Satisfied O O O O O O O O O	Neut G G G e resulted in dec	ep learning.	Dissatisfied O O	0 0
Teaching Advising Academic Support Services Classroom/Lab Facilities Please provide examples of practic	Very Satisfied O O O O O O O O O O O O O O O O O O	Satisfied O O O O O O O O O	Neut G G G e resulted in dec	ep learning.	Dissatisfied O O	0 0
Teaching Advising Academic Support Services Classroom/Lab Facilities Please provide examples of practic	Very Satisfied O O O O O O O O O O O O O O O O O O	Satisfied O O O O O O O O O	Neut G G G e resulted in dec	ep learning.	Dissatisfied O O	0
Teaching Advising Academic Support Services Classroom/Lab Facilities Please provide examples of practic	Very Satisfied O O O O O O O O O O O O O O O O O O	Satisfied	e resulted in dee	ep learning.	Dissatisfied	0 0

2016 Core Curriculum Survey

1 - 15		are complete	ed at Marshall Univer	art by the ci	or time semication	
16 - 30			91 - 105			
31 - 45			O 106 - 120			
46 - 60			□ 120 +			
61 - 75						
ease indicate your level of agree e. general education courses. If y oplicable." arshall's core curriculum courses	you have not taken	any Core C				
	Strongly Agree	Agree	Neither Agree nor Disagree	Disagree	Strongly Disagree	Not Applicable
evelop the ability to write feotively.	0	0	0	0	0	0
e numerical information to explore al world problems.	0	0	0	0	0	0
nd scholarly information, to evaluate oritically and to use it effectively.	0	0	0	0	0	0
evelop the ability to express myself fectively through speaking.	0	0	0	0	0	0
	Strongly Agree	Agree	Neither Agree nor Disagree	Disagree	Strongly Disagree	Not Applicabl
evelop multioultural and global erspectives.	0	0	0	0	0	0
nalyze and evaluate issues and solve al-world problems in a manner that ethical and supportive of our civic ell-being.	0	0	0	0	0	0
oaden my appreciation of the arts.	0	0	0	0	0	0
amine issues from multiple erspectives.	0	0	0	0	0	0
	Strongly Agree	Agree	Neither Agree nor Disagree	Disagree	Strongly Disagree	Not Applicabl
e what I know to solve novel oblems.	0	0	0	0	0	0
sess my own values and examine her viewpoints and oredible ridenoe.	0	0	0	0	0	0
etermine how to improve my own arning.	0	0	0	0	0	0
e knowledge from more than one ea of study to explore issues or	0	0	0	0	0	0

			4
nk you for completing this sur	vey. Clicking on the arrow to the ri	ght will register your responses.	

Appendix XVI Sample Graduation Survey (College of Arts and Media)

IRB Invitation

Dear Marshall University Senior:

You are invited to participate in a survey entitled, "Marshall University Graduation Survey" designed to assess your satisfaction with your educational experience while at Marshall University and to determine how effectively Marshall has prepared you for further education or the workplace. The study is being conducted by Marshall University's Office of Assessment. Information from this survey will be used to help us improve campus services that are important to student success. The Office of Assessment will keep all personal identifying information confidential. It will provide only aggregate or de-identified results to the College of Arts and Media.

This online survey is comprised of multiple choice, short answer, and Likert scale questions and will take approximately 10 minutes to complete. There are no known risks involved with this survey. Participation is completely voluntary and there will be no penalty or loss of benefits if you choose not to complete the survey. You also may choose not to answer any question by simply leaving it blank. Completing the survey indicates your consent for us to use the answers you supply.

If you have any questions about the study, you may contact Dr. Mary Reynolds, Associate Vice President for Assessment and Quality Initiatives at (304) 696-2987. If you have any questions concerning your rights as a research participant, you may contact the Marshall University Office of Research Integrity at (304) 696-4303.

By completing this survey, you confirm that you are 18 years of age or older. If you have read this form and agree to take part in the survey, please click the arrow below.

· Please print or copy this page for your records.

Further Directions

The survey consists of more than one page. When finished with each page, click the right arrow to proceed to the next. You may also return to a previous page to change answers by clicking on the left arrow. You will know how close you are to being finished by tracking the progress bar at the bottom of the page. A "thank-you" page will appear when you have finished the survey.

COFA Questions

Please indicate your level of satisfaction with these elements of your experience in the College of Arts and Media (Previously College of Fine Arts or School of Journalism and Mass Communications):

	Very Satisfied	Satisfied	Neutral	Dissatisfied	Very Dissatisfied
The ourrioulum (Did it prepare you to meet the demands of your chosen oareer?)	0	0	0	0	0
The ourriculum (Did it follow a logical learning sequence?)	0	0	0	0	0
Faculty (Were they available to you for advising or other counseling?)	0	0	0	0	0
Faculty (Were they helpful to you in your pursuit of your education?)	0	0	0	0	0
Faculty and Staff (Were they helpful to you in career planning?)	0	0	0	0	0
	Very Satisfied	Satisfied	Neutral	Dissatisfied	Very Dissatisfied
Student participation (Was it encouraged for departmental and collegiate activities?)	0	0	0	0	0
The program (Did it assist in improving your skills and techniques in your shosen field?)	0	0	0	0	0
Educational facilities	0	0	0	0	0
Educational equipment	0	0	0	0	0
General Studies requirements (Were they appropriate to the BFA degree?)	0	0	0	0	0
	Very Satisfied	Satisfied	Neutral	Dissatisfied	Very Dissatisfied
The Dean's Office (Was it helpful?)	0	0	0	0	0

The College and Department were equally supportive of women and men.	0	0	0	0	0
The College and Department were equally supportive of all racial/ethnic groups	0	0	0	0	0
The degree to which department and college aided in your education	0	0	0	0	0
Overall value of your college experience	0	0	0	0	0
ersonal and Educational Information	1				
Family Status					
Married, no children		○ Singl	e, no children		
Married, with children		○ Singl	e, with children		
Residence at time of admission					
○ In-State					
○ Metro					
Out-of-State					
Number of semesters enrolled to o	omplete vour degree ()	Note: One semeste	r is equal to fall spri	ng or summer resu	Iting in the
potential for three semesters in or		Note: One semeste	i is equal to lall, spri	ing, or summer, resu	icing in the
Fewer than 8 semesters		() 15 se	mesters		
○ 8 semesters		○ 16 se	mesters		
9 semesters		○ 17 se	mesters		
10 semesters		○ 18 se	mesters		
11 semesters		○ 19 se	mesters		
12 semesters		○ 20 se	mesters		
13 semesters		○ More	than 20 semesters		
14 semesters					
While pursuing your degree, did yo	ou				
Originally enroll and stay at Marshall					
Transfer from a 2-year institution or					
☐ Transfer from another 4-year institut					
During the last year of your studie	s, now many hours a v	veek did you work	while attending clas	ses!	
○ None					
① 1 - 10 ② 11 - 20					
0 21 - 30					
More than 30					
- More chair so					
Which of the following best describ	es your educational o	bjective while atte	nding Marshall Univ	ersity?	
Begin my first oareer					
Advance in current career					
Change career					
Non-oareer objective					

Upon graduation, what was the dollar amount of your educations	
No indebtedness	\$10,000 - \$14,999
Up to \$4,999	\$15,000 - \$19,999
© \$5,000 - \$9,999	Over \$20,000
Did you take part in an internship, practicum or other structured	work experience related to your major and anticipated career?
① Yes	, , , , , , , , , , , , , , , , , , , ,
○ No	
If you answered "yes" to the previous question, did that experience	te increase your ability to secure employment or employment offers?
○ Yes	, , , , , , , , , , , , , , , , , , , ,
○ No	
Insufficient information to answer this question	
w	
When I graduate from Marshall University I plan to (check all that	
Attend graduate school	Work for a non-profit organization, e.g. hospital, university, public school, etc in a position related to my field of study.
Complete additional undergraduate ooursework	Work for a non-profit organization, e.g. hospital, university, public school, etc in a position NOT related to my field of study.
Continue to work at the same job I have at present	Work for a volunteer or service organization, e.g. Peace Corps, AmeriCorps, City Year, etc.
Enter the military	Begin my own business
$\hfill \hfill $	Start or raise a family
Work for a private sector company or corporation in a position NOT related to my field of study.	Take time off (to travel, etc.)
Work for a local, state, or federal agency in a position related to my field of study.	Undecided or no plans
Work for a local, state, or federal agency in a position NOT related to my field of study.	Other
If you plan to continue your education and have applied to instituto institutions of higher education	rtions of higher education, please check all that apply: I have applie
Within 50 miles of my college town	In at least one of WV's neighboring states (OH, KY, VA, MD, PA)
Within 50 miles of my home town	Within the US, but outside the above boundaries
Over 50 miles, but within 500 miles of my college town	Internationally
Over 50 miles, but within 500 miles of my home town	Other (please specify)
□ In WV	
Have you been accepted by a higher-level educational program?	
☐ Yes	
□ No	
If you have been accepted by a higher level institution, what insti	itution do you plan to attend?
aluation of Educational Experience	
While pursuing my degree at Marshall University	

	Strongly Agree	Agree	Neither Agree nor Disagree	Disagree	Strongly Disagree
developed the ability to write effectively.	0	0	0	0	0
used numerical information to xplore real world problems.	0	0	0	0	0
earned to find scholarly information, evaluate it critically and to use it fectively.	0	0	0	0	0
gained expertise in the use of schnology important in my field of udy.	0	0	0	0	0
acquired sufficient skills and nowledge to prepare for career- elated positions.	0	0	0	0	0
developed the ability to express syself effectively through speaking.	0	0	0	0	0
	Strongly Agree	Agree	Neither Agree nor Disagree	Disagree	Strongly Disagree
developed multioultural and global erspectives.	0	0	0	0	0
riting intensive courses helped me improve my writing skills.	0	0	0	0	0
y olasses challenged me to analyze of evaluate issues and to solve real- order problems in a manner that is thical and supportive of our civic ell being.	0	0	0	0	0
broadened my appreciation for the ts.	0	0	0	0	0
y capstone course challenged me to o my best work.	0	0	0	0	0
earned to examine issues from ultiple perspectives.	0	0	0	0	0
	Strongly Agree	Agree	Neither Agree nor Disagree	Disagree	Strongly Disagree
earned to use what I know to solve ovel problems.	0	0	0	0	0
earned to assess my own values and examine other viewpoints and edible evidence.	0	0	0	0	0
determined how to improve my own arning and to engage in lifelong arning.	0	0	0	0	0
used knowledge from more than one rea of study to explore issues or to olve problems.	0	0	0	0	0
low that I have completed my deg	ree,		Neither Agree nor		
	Strongly Agree	Agree	Disagree	Disagree	Strongly Disagree
feel adequately prepared for a areer and/or graduate or rofessional study in my major field.	0	0	0	0	0
pelieve that Marshall University's rogram in my major field is of high uality.	0	0	0	0	0
would recommend to others that ney study the same program at arshall.	0	0	0	0	0
would recommend Marshall to cospective students.	0	0	0	0	0
lease rate your level of satisfactio	on with the quality of	the following at I	Marshall:		
-	Very Satisfied	Satisfied	Neutral	Dissatisfied	Very Dissatisfied
	0	0	0	0	0
eaching					
Teaching Idvising	0	0	0	0	0

other areer path you have chosen? major field? all that apply): over 50 miles, but within 500 miles of your home town?
major field?
e all that apply):
e all that apply):
e all that apply):
•
over 500 miles from your college town
over 500 miles from your home town
\$35,001 - \$40,000
S40,001 - \$45,000
\$45,001 - \$50,000
More than \$50,000
I have not yet accepted employment

Marshall JobTrax	On-campus recruitment event
Resume assistance	Career Fair
Career Advising	Other
Mook Interviewing	
Thank you for completing the College of Arts and Media's Graduation Survey. will be complete and you will not be able to change responses.	Please be advised that, once you have clicked on the right arrow, your survey

Appendix XVII Freshman Survey: 2015

IRB Consent Form

Dear Marshall University Freshman:

You are invited to participate in a survey entitled, "Marshall University Freshman Survey" designed to assess your perceptions of learning during the fall 2015 semester. The study is being conducted by Marshall University's Office of Assessment. Information from this survey will be used to help us identify the outcomes students feel they have achieved during the fall semester of their freshman year at Marshall. The Office of Assessment will keep all personal identifying information confidential.

This online survey is comprised of 28 statements regarding educational experiences. You will be asked to indicate the extent to which you have engaged in these experiences. It should take no more than five minutes to complete. There are no known risks involved by participating in this survey. Participation is completely voluntary and there will be no penalty or loss of benefits if you choose not to complete the survey. You also may choose not to answer any question by simply leaving it blank. Completing the survey indicates your consent for us to use the answers you supply.

If you have any questions about the study, you may contact Dr. Mary Reynolds, Associate Vice President for Assessment and Quality Initiatives at (304) 696-2987. If you have any questions concerning your rights as a research participant, you may contact the Marshall University Office of Research Integrity at (304) 696-4303. By completing this survey, you confirm that you are 18 years of age or older. If you have read this form and agree to take part in the survey, please click the arrow below.

Please print or copy this page for your records and click on the arrow on the bottom right side of the page to begin the survey.

Survey

During the fall semester of 2015, about how often have you done the following?

	u	**		
	Very Often	Often	Sometimes	Never
Jsed ideas from different courses when completing assignments.	0	0	0	0
onneoted your learning to societal roblems or issues.	0	0	0	0
noluded diverse perspectives political, religious, racial/ethnio, ender, etc.) in course discussions or assignments.	0	0	0	0
Examined the strengths and veaknesses of your own views on a opio or issue.	0	0	0	0
ried to better understand someone else's views by imagining how an issue ooks from his or her perspective.	0	0	0	0
earned something that changed the ray you understand an issue or oncept.	0	0	0	0
onnected ideas from your courses to our prior experience and knowledge.	0	0	0	0
	Very Often	Often	Sometimes	Never
isoussed oourse topios, ideas, or onoepts with a faculty member utside of class.	0	0	0	0
pplied facts, theories, or methods to ractical problems or to new ituations.	0	0	0	0
nalyzed an idea, experience, or line of reasoning in depth by examining its parts.	0	0	0	0
valuated a point of view, decision, or information source.	0	0	0	0
ormed a new idea or understanding rom various pieces of information.	0	0	0	0
ound scholarly information, evaluated it oritically and used it	0	0	0	0

Assessed your own values and examined other viewpoints and	0	0	0	0
redible evidence.	0	0	0	0
	Very Often	Often	Sometimes	Never
dentified ways to improve your own earning.	0	0	0	0
nalyzed and evaluated issues to olve real-world problems in a manner hat was ethical and supportive of our ivio well-being.	0	0	0	0
xamined issues from multiple erspectives.	0	0	0	0
Ised knowledge from more than one rea of study to explore issues or to olve problems.	0	0	0	0
lsed what you know to solve new roblems.	0	0	0	0
isoussed multicultural and global sues.	0	0	0	0
Jsed numerical information to examine a real-world problem or ssue.	0	0	0	0
	Very Often	Often	Sometimes	Never
ynthesized and organized ideas, oformation, or experiences into new, nore complex interpretations and elationships.	0	0	0	0
ade judgments about how others athered, interpreted, and assessed ata.	0	0	0	0
Vorked on a paper or project that equired integrating ideas or nformation from various sources.	0	0	0	0
isoussed ideas from readings or lasses with others outside of class students, family members, oworkers, etc.)	0	0	0	0
ompleted writing assignments.	0	0	0	0
lade class presentations.	0	0	0	0
Lassroom learning communities ar ndicate your level of agreement w		ourses that have simila	ar themes and a common	core of students. Pleas
	Strongly Agree	Agree	Disagree	Strongly Disagree
uring this past semester, I was a nember of a classroom learning	0	0	0	0

Appendix XVIII Partial Marshall's CLA+ Institutional Report for Academic Year 2015-2016: Appendices and previous years' reports can be found at www.marshall.edu/assessment/GenEdAssessment.aspx.

Spring 2016 CLA+ Results Institutional Report Marshall University cla+

EXECUTIVE SUMMARY

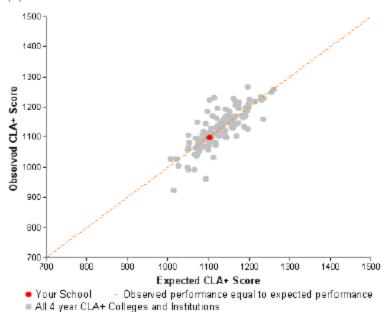
CLA+ has two primary uses. The first use—helping institutions estimate their contributions to the development of students' higher-order thinking skills—is achieved through growth estimates, as well as overall evidence of students' competency in critical-thinking and written communication. The second use highlights these skills for individual students; CLA+ results provide a valuable tool for potential employers and graduate schools to ascertain the depth of a studenti's critical-thinking and written-communication skills. With CLA+ Career Connect, those results become accessible and actionable. CLA+ Career Connect gives students a leg up in today's competitive job market, enabling them to: post electronic badges verifying their performance to LinkedIn or other social networking profiles; attend exclusive career fairs with prominent employers; and feature their results on digital credential profiles.

CLA+ results are a powerful tool for assessing students' critical-thinking and written communication skills, measuring growth on these skills, and determining how your institution compares to other colleges and universities using CLA+.

Marshall University has a freshman Total CLA+ score of 977; this score is greater than or equal to the average freshman score at 26% of CLA+ schools. A score of 977 demonstrates Basic mastery of the critical-thinking and written-communication skills measured by CLA+.

Marshall University's senior Total CLA+ score is 1100, which is better than or equal to the average senior score at 31% of CLA+ schools. A score of 1100 signifies Proficient mastery of the skills measured by CLA+.

Given the mean CLA+ performance of Marshall University's freshmen and the entering academic ability of its seniors Marshall University's value added is Near what would be expected relative to schools testing similar populations of students.



In addition to the information provided here, key metrics contained in this report include Mastery Levels, subscores, growth estimates, and percentile rankings:

Mastery Levels

CLA+ Mastery Levels allow distinctions in student performance relative to students' proficiency in critical thinking and written communication. These levels contextualize CLA+ scores by interpreting test results in relation to the qualities exhibited by examinees. Each Mastery Level—Below Basic, Basic, Proficient, Accomplished, and Advanced—corresponds to specific evidence of critical-thinking and written-communication skills.

CLA+ Subscores

In addition to total scores, there are six subscores reported across CLA+. The Performance Task—an essay-based section of the exam—is scored in three skill areas: Analysis and Problem Solving, Writing Effectiveness, and Writing Mechanics. Students receive criterion-referenced subscores for each skill category based on key characteristics of their written responses. Selected-Response Questions are also scored in three areas: Scientific and Quantitative Reasoning, Critical Reading and Evaluation, and Critique an Argument. These subscores are scored based on the number of correct responses that students provide.

Growth Estimates

The institutional report contains two types of growth estimates: effect sizes and value-added scores.

Effect sizes characterize the amount of growth shown across classes, and are reported in standard deviation units. (Standard deviation is a measure of the distance between the mean, or average, and all other values in a score set.) Effect sizes are calculated by subtracting the mean scores of the freshmen from the mean scores of each subsequent class and dividing these amounts by the standard deviation of the freshman scores.

Value-added scores provide estimates of growth relative to other CLA+ schools. Specifically, value-added scores—also reported in standard deviation units—indicate the degree to which observed senior mean CLA+ scores meet, exceed, or fall below expectations as established by two factors: the seniors' entering academic ability (EAA) and the mean CLA+ performance of freshmen at the school, which serves as a control for any selection effects not addressed by EAA.

Percentile Rankings

Percentile rankings allow for normative interpretations of your students' performance. These rankings are provided for your students' CLA+ scores, as well as for your institutional value-added scores, and indicate how well your institution performed relative to other CLA+ colleges and universities. Percentile rankings indicate the percentage of CLA+ institutions whose scores are equal to or less than your own.

Please see Sections 1-6 for a full set of institutional results.

In addition to your institutional results, your CLA+ institutional report includes a wide variety of information related to the measurement of higher-order thinking skills. Each section and appendix builds on the next to provide you with a full appreciation of how the CLA+ can support the educational mission at your school. The CLA+ institutional report's appendices include information to help you learn about CLA+ measurement, understand relevant statistical concepts, interpret your school's data, examine your performance in relation to performance at other CLA+ schools, and use CLA+ data to enhance student learning at your school.

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SECTION 1: SUMMARY RESULTS, BY CLASS

Number of Students Tested, by Class

Freshmen: 59 Sophomores: N/A Juniors: N/A Seniors: 106

Summary CLA+ Results, by Class							
		MEAN SCORE	STANDARD DEVIATION	ZE TH PERCENTILE SCORE	76 TH PERCENTILE SCORE	MEAN SCORE PERCENTILE RANK	EFFECT SIZEV. FRESHMEN
TOTAL CLA+ SCORE	Freshmen	977	101	907	1067	26	
	Sophomores	N/A	N/A	N/A	N/A	N/A	N/A
	Juniors	N/A	N/A	N/A	N/A	N/A	N/A
	Seniors	1100	124	1021	1182	31	1.22
PERFORMANCE TASK	Freshmen	927	138	826	1042	15	
	Sophomores	N/A	N/A	N/A	N/A	N/A	N/A
	Juniors	N/A	N/A	N/A	N/A	N/A	N/A
	Seniors	1101	144	1014	1230	37	1.26
SELECTED- RESPONSE	Freshmen	1027	146	925	1139	47	
QUESTIONS	Sophomores	N/A	N/A	N/A	N/A	N/A	N/A
	Juniors	N/A	N/A	N/A	N/A	N/A	N/A
	Seniors	1098	170	974	1235	25	0.49
ENTERING ACADEMIC	Freshmen	1031	130	950	1150	53	
ABILITY	Sophomores	N/A	N/A	N/A	N/A	N/A	
	Juniors	N/A	N/A	N/A	N/A	N/A	
	Seniors	1040	144	950	1110	40	

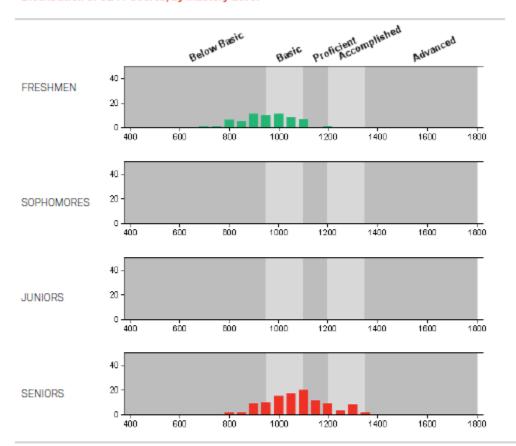
Marshall University has a senior Total CLA+ score of 1100 and percentile rank of 31. The corresponding Mastery Level for this score is Proficient.

Spring 2016 CLA+ Results

Marshall University

SECTION 2: DISTRIBUTION OF MASTERY LEVELS

Distribution of CLA+ Scores, by Mastery Level



Mastery Levels, by Class

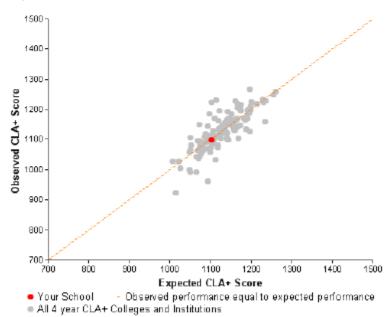
	MEAN TOTAL CLA+ SCORE	MEAN MASTERY LEVEL	PERCENT BELOW BASIC	PERCENT BASIC	PERCENT PROFICIENT	PERCENT ACCOMPLISHED	PERCENT ADVANCED
Freshmen	977	Basic	42	44	14	0	0
Sophomores	N/A	N/A	N/A	N/A	N/A	N/A	N/A
Juniors	N/A	N/A	N/A	N/A	N/A	N/A	N/A
Seniors	1100	Proficient	16	33	37	12	2

SECTION 3: VALUE-ADDED ESTIMATES

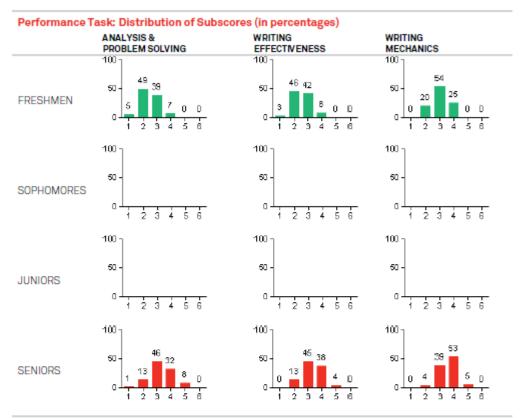
	EXPECTED SENIOR MEAN CLA+SCORE	ACTUAL SENIOR MEAN CLA+ SCORE
Total CLA+ Score	1103	1100
Performance Task	1076	1101
Selected-Response Questions	1118	1098

	VALUE-ADDED	UE-ADDED PERFORMANCE		CONFIDENCE INTERVAL BOUNDS		
	SCORE	LEVEL	RANK	LOWER	UPPER	
Total CLA+ Score	-0.07	Near	44	-0.58	0.44	
Performance Task	0.48	Near	75	-0.07	1.03	
Selected-Response Questions	-0.46	Near	20	-1.07	0.15	

Expected vs. Observed CLA+ Scores



SECTION 4: CLA+ SUBSCORES



NOTE: The Performance Task subscore categories are scored on a scale of 1 through 6.

Selected-Response Questions: Mean Subscores

	SCIENT	IFIC &		CRITICA	L				
	QUANTITATIVE REASONING		READIN	READING & EVALUATION		CRITIQUE AN ARGUMENT			
		25 th	75 th		Z5 th	75 th		25 th	75 th
	Mean	Percentile	Percentile	Mean	Percentile	Percentile	Mean	Percentile	Percentile
	Score	Score	Score	Score	Score	Score	Score	Score	Score
FRESHMEN	487	426	538	491	405	572	514	446	581
SOPHOMORES	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
JUNIORS	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
SENIORS	515	464	565	522	449	594	551	506	604

NOTE: The selected-response section subscores are reported on a scale ranging approximately from 200 to 800.

SECTION 5: STUDENT EFFORT AND ENGAGEMENT

Student Effort and Engagement Survey Responses

How much effort did you put into the written-response task/ selected-response questions?

		NO EFFORTAT	A LITTLE EFFORT	A MODERATE AMOUNT OF EFFORT	A LOT OF EFFORT	MY BEST EFFORT
PERFORMANCE TASK	Freshmen	2%	10%	42%	34%	12%
	Sophomores	N/A	N/A	N/A	N/A	N/A
	Juniors	N/A	N/A	N/A	N/A	N/A
	Seniors	2%	1%	48%	30%	19%
SELECTED- RESPONSE QUESTIONS	Freshmen	8%	24%	47%	12%	8%
	Sophomores	N/A	N/A	N/A	N/A	N/A
	Juniors	N/A	N/A	N/A	N/A	N/A
	Seniors	3%	25%	57%	11%	5%

How engaging did you find the written-response task/ selected-response questions?

		NOT AT ALL ENGAGING	SLIGHTLY ENGAGING	MODERATELY ENGAGING	VERY ENGAGING	EXTREMELY ENGAGING
PERFORMANCE TASK	Freshmen	17%	17%	44%	15%	7%
	Sophomores	N/A	N/A	N/A	N/A	N/A
	Juniors	N/A	N/A	N/A	N/A	N/A
	Seniors	10%	26%	38%	22%	4%
SELECTED- RESPONSE QUESTIONS	Freshmen	31%	32%	25%	8%	3%
	Sophomores	N/A	N/A	N/A	N/A	N/A
	Juniors	N/A	N/A	N/A	N/A	N/A
	Seniors	40%	32%	24%	4%	1%

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SECTION 6: STUDENT SAMPLE SUMMARY

Student Sa	ample Summary								
		FRESH			OMORES	JUNIO		SENIO	
DEMOGRAPH TRANSFER	IIC CHARACTERISTIC	N	%	N	%	N	%	N	%
IKANSFER	Transfer Students			N/A	N/A	N/A	N/A	0	0%
	Non-Transfer Students			N/A	N/A	N/A	N/A	106	100%
GENDER	Male	32	54%	N/A	N/A	N/A	N/A	27	25%
	Female	25	42%	N/A	N/A	N/A	N/A	73	69%
	Decline to State	2	3%	N/A	N/A	N/A	N/A	6	6%
PRIMARY	English	57	97%	N/A	N/A	N/A	N/A	105	99%
ANGUAGE	Other	2	3%	N/A	N/A	N/A	N/A	1	1%
FIELD	Sciences & Engineering	13	22%	N/A	N/A	N/A	N/A	2	2%
OF STUDY	Social Sciences	9	15%	N/A	N/A	N/A	N/A	4	4%
	Humanities & Languages	7	12%	N/A	N/A	N/A	N/A	16	15%
	Business	8	14%	N/A	N/A	N/A	N/A	1	1%
	Helping / Services	15	25%	N/A	N/A	N/A	N/A	68	64%
	Undecided / Other / N/A	7	12%	N/A	N/A	N/A	N/A	15	14%
FIELD/ ETHNICITY	American Indian / Alaska Native /	0	0%	N/A	N/A	N/A	N/A	0	0%
INNICIT	Indigenous Asian (including Indian subcontinent and Philippines)	1	2%	N/A	N/A	N/A	N/A	1	1%
	Native Hawaiian or other Pacific Islander	0	0%	N/A	N/A	N/A	N/A	0	0%
	African-American / Black (including African and Caribbean), non-Hispanic	5	8%	N/A	N/A	N/A	N/A	4	4%
	Hispanic or Latino	1	2%	N/A	N/A	N/A	N/A	2	2%
	White (including Middle Eastern), non-Hispanic	49	83%	N/A	N/A	N/A	N/A	92	87%
	Other	2	3%	N/A	N/A	N/A	N/A	2	2%
	Decline to State	1	2%	N/A	N/A	N/A	N/A	5	5%
PARENT	Less than High School	3	5%	N/A	N/A	N/A	N/A	2	2%
EDUCATION	High School	12	20%	N/A	N/A	N/A	N/A	17	16%
	Some College	11	19%	N/A	N/A	N/A	N/A	31	29%
	Bachelor's Degree	23	39%	N/A	N/A	N/A	N/A	28	26%
	Graduate or Post-Graduate Degree	10	17%	N/A	N/A	N/A	N/A	28	26%
	Don't Know / N/A	0	0%	N/A	N/A	N/A	N/A	0	0%

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Appendix XIX

Executive Summary of Freshman Baseline/FYS/Senior Assessment Results for Academic Year 2015-2016: Previous years' reports can be found at www.marshall.edu/assessment/GenEdAssessment.aspx.

Comparison of Freshman Baseline with First Year Seminar and Senior Exiting Assessment Results

Academic Year 2015 – 2016

Summer Assessment Workgroup Members: Marie Archambault, Cam Brammer, Kim DeTardo-Bora, Robert Ellison, Victor Fet, Marty Laubach, Joan St. Germain, Anita Walz, Mary Welch, Mary Beth Reynolds (Office of Assessment), and Tim Melvin (Office of Assessment)

Executive Summary

Background

Recommendations from 2015 Assessment Workgroup (with current status in red)

The 2015 Summer Workgroup noted that the revision of the FYS final assessment, which allows all students to complete the assessment online, was a positive step. However, members of the group expressed concern about the length of some of the documents the students must read and evaluate before making their recommendations for the problem they must solve. We noted that the FYS Advisory Board decided to begin using real documents in the faculty developed scenarios rather than documents created by faculty. The rationale for this was that the task would be more authentic because, in the real world, professionals are called upon to identify and evaluate such documents. However, members of the assessment workgroup pointed out that, in the real world, people typically have longer than two hours to do this. There was concern that the students had to spend so long reading the documents that they didn't have sufficient time to fully evaluate them and thoughtfully develop their recommendations. We note that two students' final assessments could not be evaluated because they had not included a recommendation, presumably running out of time before getting to that part of the assessment. The assessment workgroup recommended several options to try to remedy these issues:

• Release the documents <u>before</u> the final exam. Instructors would tell students they should have read the documents before arriving for the exam. Since the exam is administered in Blackboard, one member suggested that it could be set up in two modules; first the documents, which would have to be read and evaluated for accuracy, relevance, and bias as a take-home part of the exam. Then, on the day of the exam itself, the second module allowing students to make a recommendation and indicate information still needed, would open. To our knowledge, no changes have been made in the administration of the FYS final exams.

- If the first option is not possible, the workgroup recommended that FYS faculty return to the previous method of using faculty created documents of a reasonable length. To our knowledge, no changes have been made in the administration of the FYS final exams.
- If students are instructed to give their recommendations in the form of a memorandum, the group recommended that <u>one</u> of the documents they read should be written in that format (or in whatever format they are asked to use to prepare their response). The scenario used for this year's baseline and senior assessments included a sample memorandum. The Assessment Workgroup noted that this was not consistently the case for the FYS exams.

Procedures for 2016 Assessment

General Procedures

In August 2015, 1,585 incoming freshmen at Marshall University completed baseline assessments (an additional 59 students completed the *Collegiate Learning Assessment* [*CLA+*]). Both assessments required students to analyze and evaluate information, solve problems, and write effectively. These skills are aligned to three of Marshall University's outcomes; *Information Literacy, Inquiry-Based Thinking*, and *Communication Fluency*. In the spring semester of 2016, 198 graduating seniors completed the same assessments (92 the Marshall assessment and 106 the *CLA+*). The 198 seniors who completed either the *CLA+* or Marshall's senior assessment did not differ significantly from the senior population in terms of entering academic ability based on ACT or SAT performance. However, the sample had a significantly higher mean college GPA (3.37) than the senior population (3.11) and the sample included a higher proportion of female students than did the population. Freshmen completing Marshall's mandatory First Year Seminar (FYS) completed assessments that were similar to those finished by incoming freshmen and graduating seniors.

In May 2016 a group of nine faculty representing several academic colleges from across the university evaluated a sample of Marshall's assessments using a rubric that allowed them to score each assessment across eight criteria (traits). These included *information needed* and source acknowledgment (Information Literacy), evidence, viewpoints, and recommendation/position (Inquiry-Based Thinking), and development, convention/format, and communication style (Communication Fluency). This project was coordinated by the Office of Assessment.

A random sample of 235 Marshall Freshman baseline assessments was drawn from the pool of 1,585 (15%) of the total number of assessments available. Since only 92 seniors completed the Marshall senior exiting assessment, we included all in our analysis, giving us a total of 327 assessments in our sample.

One hundred eighty-eight (188) of the 235 freshmen from our baseline sample (80%) completed FYS assessments. The reasons we had no FYS assessments from 47 of the students in the baseline sample were as follows: 12 were enrolled in, and received credit for FYS, but did not complete the final exam; 6 were enrolled in, but did not receive credit for FYS; 7 were not enrolled in FYS during academic year 2014-2015; 2

completed FYS during summer 2015, so their scores could not be used as a "post baseline" measure; and 20 students withdrew from Marshall without completing FYS.

All assessments were de-identified and, for the freshman baseline/senior comparisons, raters did not know which were completed by freshmen and which by seniors. Each assessment had two independent raters. Please see the supporting information that follows this summary for a detailed explanation of scoring procedures.

Results and Analysis

Comparison of Freshman Baseline to Senior Exiting Results and to Results at the End of FYS

Mean scores (on a scale of 1 – 4) for seniors were significantly higher than freshman baseline measures on all criteria (traits). However, mean performance for seniors ranged from a low of 2.23 (*Inquiry-Based Thinking*: viewpoints) to a high of 2.77 (*Communication Fluency*: development), indicating, as has been the case for the past four years, that there is room for improvement among Marshall's graduating seniors. Mean differences between freshman baseline performance and senior exiting performance ranged from a low of 0.27 for *Inquiry-Based Thinking*: viewpoints to a high of 0.78 for *Communication Fluency*: convention/format. We note that, for the past four years, the difference between the mean scores of freshmen and seniors has averaged about one-half of a point (ranging from 0.27 to 0.96). Mean scores for seniors have never exceeded 3.04 (*Inquiry-Based Thinking*: recommendations) in 2013, with the average being about 2.6.

Last year's (2015) workgroup discussed the two-pronged approach that Marshall uses to compare student performance in *Information Literacy, Inquiry-Based Thinking* (aka *Critical Thinking*), and *Communication Fluency* between freshman baseline and senior exiting assessments, namely that some students take the nationally standardized *Collegiate Learning Assessment (CLA+)*, while the rest take a similar assessment developed by Marshall University faculty. This process works well for freshmen and, although having representative senior samples that are large enough to draw meaningful conclusions remains problematic, the cooperation of Marshall's senior capstone instructors who ask their students to participate has helped in this regard. We also note that for the past several years the *CLA+* and Marshall Assessment results have mirrored each other. Results of the *CLA+* for the past three years (and of the *CLA* for several years prior to that) have shown Marshall University's value-added in student growth in these outcomes between freshman and senior year to be at the statistically calculated "expected level." For the past three years, the average baseline *CLA+* score of our freshman has been at the *basic* level, while the average score of our seniors has been at the *proficient* level. Likewise, for the past four years our seniors have scored significantly higher than our freshmen on all outcomes/traits of the Marshall developed assessment. As noted in the preceding paragraph, despite these results there continues to be room for our seniors to improve in all outcomes addressed in these assessments.

For the 188 students who completed both baseline and FYS assessments, *paired-samples t-tests* using adjusted alpha levels to control for Type I error (.025 for information literacy), (.017 for Inquiry-Based Thinking), and (.017 for Communication Fluency) showed significant mean differences between freshman baseline and FYS results for all outcomes/traits *except Communication Fluency*: communication style (which is not an outcome of FYS). We note that, in last year's report, we recommended that "the FYS Director and course instructors place additional emphasis on helping students to determine information needed and to critically examine various viewpoints surrounding real-world problems." This year's results showed significant improvements over last year in FYS students' performance in these two areas (*Information Literacy*: information needed and *Inquiry-Based Thinking*: viewpoints).

Recommendations from the 2016 Assessment Workgroup

Recommendations regarding baseline and senior assessments

1. The Assessment Workgroup recommended that baseline and senior exams include a preliminary check sheet asking students to rate each document for *accuracy*, *bias*, and *relevance*. We felt that this task, although not identical to the one asked of students during the FYS final exam due to the differing lengths of time allotted to the two assessments (90 minutes for baseline and senior assessments as compared to 120 minutes for FYS final exams) would provide greater equivalence between these baseline/senior assessments and FYS final exams.

Recommendations regarding FYS Exams

- 1. The Assessment Workgroup continues to be concerned about the length of some of the documents accompanying the FYS final exams and, perhaps more pointedly, the variation in the length of these documents <u>among</u> the exams given. These documents range in length from 75 pages for the *Concealed Weapons Scenario* to 16 for the *Influenza Scenario*. That said, the page count is not a perfect predictor of difficulty because the density of print per page varies from document to document. Further, statistical analysis of the mean differences in student performance among the eight scenarios used during 2015-2016 on the eight traits of the rubric revealed only one scenario on which students scored significantly lower than on the others; that was the *Social Media Scenario*, which had a moderate number of document pages (20) for students to read. The Assessment Workgroup recommends that the FYS Director and faculty review 2015 recommendations regarding the issue of page length and take the scenario comparison results from the Assessment Workgroup into consideration when deploying final exams.
- 2. The Assessment Workgroup recommended that FYS exams be reconfigured to ask students to discuss additional information they might need to make a final recommendation <u>before</u> they make the recommendation. This would bring the exam format more into line with what students are asked to do at baseline.
- 3. The Assessment Workgroup recommended that students in FYS be <u>explicitly</u> asked to <u>use</u> information they provided regarding *bias*, relevance, and accuracy in items 1 7 of the final exam when composing their final recommendation. The Workgroup further noted that

- students should be told that the main part of the exam is the final recommendation and that this should be carefully considered and composed.
- 4. Workgroup members reiterated that all scenarios should include a sample of the format in which the final recommendation should be written.

Recommendations regarding Baseline/FYS/Senior Rubric

1. The Assessment Workgroup recommended re-examining *Communication Style* trait of the rubric again next year before beginning assessments.

Appendix XX

Executive Summary of GEAR Assessment Results for Academic Year 2014-2015: Previous years' reports can be found at www.marshall.edu/assessment/GenEdAssessment.aspx.

Analysis of Artifacts from Marshall's General Education Assessment Repository

Spring Semester 2015

Summer Assessment Workgroup Members: Marie Archambault, Harold Blanco, Kim DeTardo-Bora, Robert Ellison, Marty Laubach, Joan St. Germain, Gregg Twietmeyer, Anita Walz, Mary Welch, and Mary Beth Reynolds (Office of Assessment)

Executive Summary

Background

Recommendations from 2014 Assessment (with current status in red)

GEAR Upload Process

- 1. Design GEAR so that instructors <u>must</u> upload assignment instructions before students can upload artifacts. Although not statistically significant in most cases, we noted a trend for a greater number of scores of 100 (assignments misaligned to outcomes) when the instructor had failed to upload the assignment instructions. Beginning with the spring 2015 GEAR assignments, instructors could not create assignments without uploading an assignment instruction file.
- 2. Redesign GEAR so that instructors (or students) must tag the assignment's outcome(s)/trait(s) <u>and</u> the outcome/trait performance levels to which the assignment is written. The Workgroup felt that this step would cause instructors and students to think more carefully about exactly what knowledge/skills are demonstrated in the artifact, as there are different outcome statements for each trait at each performance level. Beginning with the spring 2015 GEAR assignments, instructors were asked to indicate the performance <u>level</u> (introductory, milestone, capstone, advanced) of each trait to which the assignment was aligned.
- 3. Redesign GEAR so that, if instructors or students align an assignment/artifact to more than one outcome or to more than two outcome traits, they will be required to indicate a rank-order for the outcomes/traits tagged. In other words, reviewers would like to know if the

- outcome/traits they are assessing were the <u>primary</u> focus of the assignment, or a secondary focus. Beginning in spring 2015, instructors were required to indicate the primary outcome to which their assignment aligned.
- 4. Concern was expressed about the small percentage of outcomes assessed this year. To increase the number of artifacts reviewed from each outcome, the workgroup recommended that we rotate outcomes on a two-three year basis. For example, we might review artifacts tagged to only three-four outcomes in year 1, the next three-four in year 2, etc. For the summer 2015 assessment, we assessed artifacts that aligned with the following outcomes: *Intercultural Thinking*, *Ethical and Civic Thinking*, and *Communication Fluency*.
- 5. The workgroup strongly recommended that uploaded artifacts be summative in nature. The nature of the artifacts (summative or formative) continues to vary by course.
- 6. The workgroup recommended that we continue to assess artifacts for one outcome (can have multiple traits tagged for outcome) at a time. We continued this process. Reviewers assessed artifacts aligned to each of these outcomes, spending two days on artifacts from each:

 Intercultural Thinking, Ethical and Civic Thinking, and Communication Fluency.
- 7. The workgroup recommended that uploaded artifacts include process papers when tagged to an outcome/trait/performance level that addresses process rather than product. This recommendation has not yet been accomplished.
- 8. The workgroup recommended that instructors be provided with clearer definitions of rubric traits, especially for those of Inquiry-Based Thinking. This recommendation has not yet been accomplished.
- 9. The workgroup did not find the GEAR free text box asking students why they (or their instructors) had aligned artifacts with specific outcome(s)/trait(s). They recommended that we rely instead on formal process papers for the process-based outcome(s)/trait(s). This recommendation has not yet been accomplished.

General Procedures for 2015 Assessment

Recommended changes outlined above in red were made to GEAR before the spring semester of 2015. All students enrolled in FYS as well as in courses carrying multicultural, international, writing intensive, service learning, and critical thinking (CT) designations were asked to upload artifacts to GEAR. Instructors were asked to create assignments aligned to *Communication Fluency* (writing intensive courses), *Ethical and Civic Thinking* (service learning courses), and *Intercultural Thinking* (multicultural and international courses). Instructors were told that it was not necessary to align the assignments to all traits for the specified learning outcome; that they should align them only to those traits the assignment specifically addressed. Instructors also were asked to indicate the *performance level* they expected students to achieve. Since FYS addresses five of the University's outcomes (*Information Literacy* and *Inquiry-Based, Integrative, Intercultural*, and *Metacognitive Thinking*) and CT courses address *Integrative Thinking* and four additional university outcomes of their choice, it was left to instructors and/or students to decide to which of the course's outcome(s) their assignments aligned. It was possible for a single assignment to align to any number of outcomes and traits. However, as noted above, instructors were required to specify the <u>primary</u> outcome to which the assignment aligned.

In May 2015 a group of nine faculty representing several academic colleges from across the university evaluated a sample of these artifacts using outcome specific rubrics. These rubrics, which can be accessed by clicking on the hyperlink for each Domain of Critical Thinking at

www.marshall.edu/assessment/LearningOutcomes.aspx, were developed as a series of outcome statements for each trait, specifying what students should be able to do at four levels of increasing challenge (introductory, milestone, capstone, and advanced). For purposes of Marshall's Baccalaureate Degree Profile, we expect students to perform at Level 3 (capstone) by the time of graduation. Based on last spring's recommendations, we focused our assessment efforts on three of the university's outcomes; Communication Fluency, Ethical and Civic Thinking, and Intercultural Thinking. This also allowed us to assess five course types (Writing Intensive [Communication Fluency], Multicultural [Intercultural Thinking], International [Intercultural Thinking], Service Learning [Ethical and Civic Thinking], and CT courses [potentially all three outcomes]. In an effort to obtain a sample that would be as free as possible from assignments that were misaligned (i.e. not aligned to the correct outcomes), we decided to restrict our sample for each of the outcomes to those that specified these outcomes as the primary focus of the course assignment. However, due to an initial error in sampling (which was quickly corrected), five artifacts included in the sample for Intercultural Thinking were aligned to that outcome as a secondary outcome. Our final sample consisted of 324 artifacts, 108 per outcome. Each artifact was read by two independent reviewers. This project was coordinated by the Office of Assessment and Quality Initiatives.

Scoring Procedures

Evaluators assessed each artifact using the following scale:

	Special Scoring Codes
Score	Explanation
100	In the opinion of the evaluator, the artifact was misaligned with the outcome/trait to which the instructor or student had tagged it.
99	The student did not upload the correct assignment or there was a technical problem with the upload that prevented the artifact from being assessed.
	Regular Scoring Codes
These co	des were given to artifacts that, in the opinion of the evaluator, were aligned with appropriate outcomes/traits and contained
enough i	information to allow assessment.
0	The artifact did not demonstrate the minimum level of performance expected at the introductory level.
1	The artifact demonstrated introductory level performance.
2	The artifact demonstrated milestone level performance.
3	The artifact demonstrated capstone level performance.
4	The artifact demonstrated advanced level performance. We should note that this is the performance level expected of graduate
	students, so we would expect it to be rarely achieved at the undergraduate level.

Please see the supporting information that follows this summary for a detailed explanation of scoring procedures.

General Information about the Sample

Approximately 42% (137) of the artifacts in our sample were drawn from courses at the 100/200 level, with the remaining 58% (187) drawn from courses at the 300/400 level. The reason why a greater proportion of artifacts were pulled from upper level courses was because we wished to assess the University's Service Learning Courses, which address *Ethical and Civic Thinking*, and Marshall offers more Service Learning courses at the 300/400 level than at the 100/200 level. This differentiates our sample from that used in summer 2014, which contained twice as many artifacts from 100/200 as from 300/400 level courses. Approximately 40% of the students in the sample were seniors, which also differed from last year's sample, which was weighted toward freshmen. Unlike last year's sample, the sample this year had equal numbers of artifacts (108) aligned to each of the three outcomes assessed.

Results and Analysis

One challenge in reporting results of GEAR assessment is that, although we assessed 324 artifacts, results were analyzed by each outcome trait. As previously noted, instructors or students were free to align assignments/artifacts to as many (or as few) outcomes and traits as they deemed appropriate. Although we assessed each artifact for only one outcome, most of these aligned to more than one of the outcome's traits. For purposes of this assessment, we also added a trait (global contexts) to the *Intercultural Thinking* outcome and deleted a trait (context/audience) to the *Communication Fluency* outcome, bringing the total number of traits across the three outcomes to 13 (3 for *Communication Fluency*, 4 for *Ethical and Civic Thinking*, and 6 for *Intercultural Thinking*). A perusal of our supporting documentation shows that the artifacts evaluated by the Assessment Workgroup tagged to a total of 799 traits. However, scores for only 661 (83%) of those traits were usable for calculating means. One hundred thirty-eight were discarded either because they were judged not to align with the traits (91; 11%) or were not able to be assessed because of student upload error (47; 6%). The chart below shows the number of artifacts aligned to each trait, the number excluded from the analysis due to receiving scores of 100 (misalignment) or 99 (student upload error), and the resulting number of scores able to be used for the analysis of means. Focusing on assessing three outcomes this year helped us to significantly increase the number of scores able to be used over last year and assessing only artifacts that had been tagged to primary outcomes reduced the number of misalignments.

Outcome	Trait	Total Artifacts Aligned	# Misaligned (Scores of 100)	# Not Able to be Assessed (Score of 99)	Total # Excluded from Analysis of Means	Total Usable Artifacts
Communication	Design/Organization	88	0	8	8	80
Fluency	Diction	58	0	5	5	53
	Communication Style	77	0	7	7	70

Ethical and Civic	Ethical Self-Awareness	87	7	1	8	79
Thinking	Professional Rules and	59	9	1	10	49
	Standards of Conduct					
	Civic Well-Being	80	2	1	3	77
	Complex Ethical Issues	44	8	1	9	35
Intercultural	Own Culture	68	6	6	12	56
Thinking	Other Cultures	81	5	5	10	71
	Communication with	15	4	2	6	9
	Others from Different					
	Cultures					
	Global Awareness	58	21	3	24	34
	Cultural Conflict	50	7	4	11	39
	Global Contexts	34	22	3	25	9

Results for *Communication Fluency* (diction and communication style) showed that mean scores of students in 300/400 level courses were significantly higher than those for students in 100/200 level courses. Results did not differ by course level for any trait of *Intercultural Thinking* and the small number of artifacts from 100/200 level courses for *Ethical and Civic Thinking* made course level comparison difficult. Juniors and seniors outperformed freshmen and sophomores on *Communication Fluency* (diction and communication style), but mean differences based on class rank were not significant for the other two outcomes.

Overall results showed mean performance for traits to range from 1.01 (*Ethical and Civic Thinking*: complex ethical issues) to 2.43 (*Communication Fluency*: design/organization). Mean performance for artifacts uploaded from 100/200 level courses ranged from 1.17 (*Intercultural Thinking*: communication with other cultures) to 2.11 (*Communication* Fluency: design/organization) and from 300/400 level courses from 1.01 (*Ethical and Civic Thinking*: complex ethical issues) to 2.54 (*Communication Fluency*: design/organization). Consistent with last year's results, *Communication Fluency* appears to be a relative strength for our students.

Results for Course Type

Writing Intensive Courses

The primary outcome to which artifacts from writing intensive courses aligned was *Communication Fluency*. Usable scores were obtained by trait as follows:

Trait	Course Level	Number	Mean Score
Design/Organization	100/200	25	2.09

	300/400	54	2.58
Diction	100/200	18	1.78
	300/400	34	2.53
Communication Style	100/200	24	1.53
	300/400	45	2.17

Mean scores for diction and communication style were significantly higher for 300/400 level courses than for 100/200 level courses.

Multicultural Courses

The primary outcome to which artifacts from multicultural courses aligned was *Intercultural Thinking*. Multicultural courses were most likely to align to the first two traits of the *Intercultural outcome* (own culture and other cultures). Usable scores were obtained by trait as follows:

Trait	Course Level	Number	Mean Score
Own Culture	100/200	35	1.22
	300/400	10	1.55
Other Cultures	100/200	41	1.7
	300/400	13	1.73
Communication with Others	100/200	2	1.0
from Different Cultures	300/400	4	1.25
Global Awareness	100/200	5	1.4
	300/400	9	1.28
Cultural Conflict	100/200	7	1.43
	300/400	7	1.57
Global Contexts	100/200	0	
	300/400	4	1.06

Although there were no significant differences between these means based on course level, we note the small number of alignments in each cell for the last four traits.

International Courses

The primary outcome to which artifacts from international courses aligned was *Intercultural Thinking*. Although the overall number of International courses in the sample was smaller than the number of Multicultural courses, we see that these courses were more likely to align assignments to the fourth and fifth outcomes of the *Intercultural outcome* (global awareness and cultural conflict). Usable scores were obtained by trait as follows:

Trait	Course Level	Number	Mean Score
Own Culture	100/200	9	1.56

	300/400	0	
Other Cultures	100/200	10	2.08
	300/400	6	1.88
Communication with Others	100/200	0	
from Different Cultures	300/400	2	2.0
Global Awareness	100/200	15	1.87
	300/400	5	1.6
Cultural Conflict	100/200	18	1.88
	300/400	2	1.13
Global Contexts	100/200	0	
	300/400	5	1.6

There were no significant differences between these means based on course level; however we note that only the traits *other cultures, global awareness, and cultural conflict* had /n/s larger than 100 and these were in 100/200 level courses.

Service Learning Courses

The primary outcome to which artifacts from service learning courses aligned was *Ethical and Civic Thinking*. Usable scores were obtained by trait as follows:

Trait	Course Level	Number	Mean Score
Ethical Self-Awareness	100/200	18	1.99
	300/400	61	1.4
Professional Rules and Standards	100/200	4	1.88
of Conduct	300/400	45	1.27
Civic Well-Being	100/200	0	
	300/400	77	1.56
Complex Ethical Issues	100/200	0	
	300/400	35	1.01

The only statistically significant difference based on course level showed that students in 100/200 level courses scored significantly higher than students in 300/400 level courses in *ethical self-awareness*. We note, however, that the 300/400 course level sample for this trait has almost 3.5 times more students than the sample for 100/200 level courses.

Critical Thinking (CT) Courses

CT courses included in the assessment sample aligned to either *Communication Fluency or to Intercultural Thinking*. All CT courses are at the 100/200 level. Results are below:

Communication Fluency			Intercultural Thinking	Intercultural Thinking		
Trait	Number	Mean Score	Trait	Number	Mean Score	
Design/Organization	25	2.09	Own Culture	19	1.71	
Diction	18	1.78	Other Cultures	20	1.88	
Communication Style	24	1.53	Communication with Others from Different Cultures	2	1.0	
			Global Awareness	18	1.83	
			Cultural Conflict	26	1.78	
			Global contexts	0		

Recommendations from the 2015 Assessment Workgroup

Recommendations Specific to the Outcomes and Assessment Rubrics

1. Redesign all university rubrics so that they are continuous in nature. This should be done by stating the Baccalaureate Degree Profile outcome statements for <u>each</u> trait and then describing four levels of increasingly sophisticated levels of performance. A revised rubric for *Intercultural Thinking* might look like this:

Trait Outcome Statements		Perforn	nance Levels	
	Level 1	Level 2	Level 3	Level 4
Evaluates generalizations				
about one's own cultural				
group(s).				
Critiques generalizations and				
expressions of bias about a				
specific cultural group.				
Analyzes how specific				
cultural beliefs, values and				
sensibilities might affect the				
way people in different				
cultural groups communicate				
with each other.				
Evaluates how specific				
approaches to global issues				
will affect multiple cultural				

communities or political institutions.		
Analyzes and untangles competing economic, religious, social, political, institutional, or geographical interests of cultural groups in conflict.		
Evaluates practical solutions to global challenges that are appropriate to their contexts.		

Reasons for this recommendation include:

- We believe that all assignments should be written to the outcome specified in the Baccalaureate Degree Profile. This will provide students with the maximum amount of practice in achieving the goals Marshall University has set for them by the time of graduation. It will have the added advantage of students seeing these outcomes occurring across courses within the Core Curriculum, thus promoting integration of outcomes across courses.
- This will reduce confusion among instructors as to what their assignments need to address. At present, most rubrics consist of outcome statements for each performance level, allowing assignments that vary across courses in terms of what students are expected to do.
- Interrater reliability continues to be problematic when using these rubrics, with the greatest problem occurring with misalignments.

 And, a quick perusal of the interrater reliability data show that often one rater feels that the assignment has been misaligned with the rubric, but the other does not. This was especially true for several trait of the *Intercultural Thinking* rubric.
- 2. Form committees consisting of key stakeholders for each university outcome to revise the university outcomes (if needed) and to revise the rubrics. For example, the committee that reviews the *Intercultural Thinking* outcome and rubric should consist of faculty who teach *International* and *Multicultural* courses, a representative from the Office of Intercultural Affairs, a representative from INTO-Marshall, and other key stakeholders as deemed appropriate. The committee that reviews the rubric for *Ethical and Civic Thinking* should consist of the Director of Service Learning, faculty who teach Service Learning courses, and additional faculty from across the University. Faculty should critically examine course assignments to help inform rubric development.
- 3. Before *Multicultural* and *International* courses are recertified by the General Education Council, faculty teaching these courses should attend a minimum of a one-hour workshop to develop assignments that align to one or more of the *Intercultural* rubric.

General Recommendations

1. The Assessment Office should provide a list of students who did not complete GEAR uploads to course instructors and a list of instructors who did not create assignments in GEAR to department chairs.

- 2. The Assessment Office should provide the GEAR shell to instructors several weeks before the beginning of the semester and <u>update</u> the student roster for each course the second week of the semester.
- 3. The Assessment Office should communicate with instructors that student work uploaded to GEAR should have enough substance to permit evaluation, i.e. should be summative, rather than formative, in nature. This recommendation was repeated from last year.
- 4. Instructors should be reminded of the importance up uploading assignment instructions to GEAR. This recommendation was made again because, despite the fact that an assignment file <u>must</u> be uploaded for an assignment to be created, a few instructors uploaded other types of file, e.g. entire course syllabus, GEAR upload instructions.

Longitudinal Analysis

For the initial assessment of artifacts uploaded to GEAR (summer 2013), all artifacts assessed were drawn from the university's First Year Seminar (FYS) course and we used these artifacts to assess all nine university outcomes. Mean performance across students ranged from a low of 0 for *Intercultural Thinking* (communication with other cultures) to a high of 1.24 for *Communication Fluency* (design/organization and diction). However, since artifacts were spread among so many outcomes, many traits had very small numbers (9 for communication with other cultures as compared to 24 for design/organization and 23 for diction). Other than the fact that all students included in the 2013 sample were freshmen, low means can be attributed to the fact that we had not yet settled on a score for misaligned artifacts, defaulting many of the scores to 0.

The second assessment of artifacts uploaded to GEAR (summer 2014) also included all nine outcomes, but we included artifacts from *Multicultural, International, Service Learning,* and *Writing Intensive* courses, in addition to those from FYS. The sample, however, continued to be skewed toward artifacts from lower level courses with freshman being the modal class rank for student artifacts in our sample. We decided to assign special codes to artifacts we felt to be misaligned to the outcomes or in cases of student upload or other technical issues that prevented assessment. This allowed us to see which outcomes/traits resulted in the greatest amount of confusion during the outcome/trait alignment process and resulted in recommendations to make sure instructors uploaded assignment instructions, specified the <u>primary</u> outcome to which their assignment aligned, and identified the performance level to which the assignment was written. Due to assessing all nine university outcomes again in 2014, we continued to have small numbers of artifacts aligned to each outcome, which led to the recommendation that we choose only three outcomes to assess in 2015, three more in 2016, and the last three in 2017 and continue to assess on a three-year cycle.

The third assessment of artifacts uploaded to GEAR (summer 2015) consisted of an in-depth assessment of artifacts that instructors aligned to the following outcomes as <u>primary</u>: *Intercultural Thinking* (due to sampling error, five of the alignments for *Intercultural Thinking* were secondary), *Ethical and Civic Thinking*, and *Communication Fluency*. One hundred eight artifacts were included for each outcome, resulting in a total of 324 artifacts. This sample resulted in higher numbers for each outcome trait. Results this year suggested a need to redesign rubrics to be continuous, rather than categorical, in nature. We recommended that all assignments address the outcomes articulated in Marshall's

Baccalaureate Degree Profile, rather than lower levels as articulated in present rubrics. To that end, workgroups will be formed during academic year 2015 – 2016 to revise the rubrics and we will communicate with course instructors regarding writing assignments to the University outcome statements. We feel that it is especially important to involve faculty who teach courses that align to the university's outcomes to be involved in revising the rubrics and outcomes (if necessary).

Finally, the past two years of assessment data have shown that Marshall's students improve their writing skills as they move through the curriculum and, specifically, as they pass from 100/200 level writing intensive courses to 300/400 level writing intensive courses.

Appendix XXI

Executive Summary of GEAR Assessment Results for Academic Year 2015-2016: Previous years' reports can be found at www.marshall.edu/assessment/GenEdAssessment.aspx.

Analysis of Artifacts from Marshall's General Education Assessment Repository

Academic Year 2015 – 2016

Summer Assessment Workgroup Members: Marie Archambault, Cam Brammer, Kim DeTardo-Bora, Robert Ellison, Victor Fet, Marty Laubach, Joan St. Germain, Anita Walz, Mary Welch, Mary Beth Reynolds (Office of Assessment), and Tim Melvin (Office of Assessment)

Executive Summary

Background

Recommendations from the 2015 Assessment Workgroup (with current status in red)

Recommendations Specific to the Outcomes and Assessment Rubrics

- 4. Redesign all university rubrics so that they are continuous in nature. This should be done by stating the Baccalaureate Degree Profile outcome statements for <u>each</u> trait and then describing four levels of increasingly sophisticated performance. Reasons for this recommendation include:
 - We believe that all assignments should be written to the outcome specified in the Baccalaureate Degree Profile. This will provide students with the maximum amount of practice in achieving the goals Marshall University has set for them by the time of graduation. It will have the added advantage of students seeing these outcomes occurring across courses within the Core Curriculum, thus promoting integration of outcomes across courses.
 - This will reduce confusion among instructors as to what their assignments need to address. At present, most rubrics consist of outcome statements for each performance level, allowing assignments that vary across courses in terms of what students are expected to do.
 - Interrater reliability continues to be problematic when using these rubrics, with the greatest problem occurring with misalignments.

 And, a quick perusal of the interrater reliability data show that often one rater feels that the assignment has been misaligned with the rubric, but the other does not. This was especially true for several traits of the *Intercultural Thinking* rubric.

(The Summer Assessment Workgroup revised the three rubrics (as drafts) used to assess this year's outcomes, *Information Literacy*, *Integrative Thinking*, and *Metacognitive Thinking*, using the format described above. Additionally, the Summer Workgroup suggested changing the *Information Literacy* outcome from "Students will revise their search strategies to find appropriate research tools, integrate relevant information from reliable sources, question and evaluate the complexity of the information environment, and use information in an ethical manner" to "Students will employ appropriate research tools, integrate relevant information from reliable sources, question and evaluate information and its sources, and use information in an ethical manner." During academic year 2015-2016, we recommend soliciting feedback from the University Assessment Committee, the General Education Council and, through them, from Marshall University's faculty. Our goal is to shepherd these changes to the Information Literacy outcome through the appropriate committee structure at Marshall. Work will continue on revisions of rubrics for the other six outcomes.

- 5. Form committees consisting of key stakeholders for each university outcome to revise the university outcomes (if needed) and to revise the rubrics. For example, the committee that reviews the *Intercultural Thinking* outcome and rubric should consist of faculty who teach *International* and *Multicultural* courses, a representative from the Office of Intercultural Affairs, a representative from INTO-Marshall, and other key stakeholders as deemed appropriate. The committee that reviews the rubric for *Ethical and Civic Thinking* should consist of the Director of Service Learning, faculty who teach Service Learning courses, and additional faculty from across the University. Faculty should critically examine course assignments to help inform rubric development. (A committee has been formed to work on the *Intercultural Thinking rubric*, but the revisions are not complete).
- 6. Before *Multicultural* and *International* courses are recertified by the General Education Council, faculty teaching these courses should attend a minimum of a one-hour workshop to develop assignments that align to one or more of the traits of the *Intercultural* rubric. (This recommendation has not been implemented).

General Recommendations

- 5. The Assessment Office should provide a list of students who did not complete GEAR uploads to course instructors and a list of instructors who did not create assignments in GEAR to department chairs. (This has not been done).
- 6. The Assessment Office should provide the GEAR shell to instructors several weeks before the beginning of the semester and <u>update</u> the student roster for each course the second week of the semester. (This recommendation was implemented at the beginning of fall 2015).
- 7. The Assessment Office should communicate with instructors that student work uploaded to GEAR should have enough substance to permit evaluation, i.e. should be summative, rather than formative, in nature. This recommendation was repeated from last year. (This has not been done).
- 8. Instructors should be reminded of the importance up uploading assignment instructions to GEAR. This recommendation was made again because, despite the fact that an assignment file <u>must</u> be uploaded for an assignment to be created, a few instructors uploaded other types of file, e.g. an entire course syllabus, GEAR upload instructions, etc. (This continues to be a part of GEAR training <u>and</u> it is not possible to create an assignment without uploading something in the assignment instruction section).

Longitudinal Analysis

For the initial assessment of artifacts uploaded to GEAR (summer 2013), all artifacts assessed were drawn from the university's First Year Seminar (FYS) course and we used these artifacts to assess all nine university outcomes. Mean performance across students ranged from a low of 0 for *Intercultural Thinking* (communication with other cultures) to a high of 1.24 for *Communication Fluency* (design/organization and diction). However, since artifacts were spread among so many outcomes, many traits had very small numbers (9 for communication with other cultures as compared to 24 for design/organization and 23 for diction). Other than the fact that all students included in the 2013 sample were freshmen, low means can be attributed to the fact that we had not yet settled on a score for misaligned artifacts, defaulting many of the scores to 0.

The second assessment of artifacts uploaded to GEAR (summer 2014) also included all nine outcomes, but we included artifacts from *Multicultural, International, Service Learning,* and *Writing Intensive* courses, in addition to those from FYS. The sample, however, continued to be skewed toward artifacts from lower level courses with freshman being the modal class rank for student artifacts in our sample. We decided to assign special codes to artifacts we felt to be misaligned to the outcomes or in cases of student upload or other technical issues that prevented assessment. This allowed us to see which outcomes/traits resulted in the greatest amount of confusion during the outcome/trait alignment process and resulted in recommendations to make sure instructors uploaded assignment instructions, specified the <u>primary</u> outcome to which their assignment aligned, and identified the performance level to which the assignment was written. Due to assessing all nine university outcomes again in 2014, we continued to have small numbers of artifacts aligned to each outcome, which led to the recommendation that we choose only three outcomes to assess in 2015, three more in 2016, and the last three in 2017 and continue to assess on a three-year cycle.

The third assessment of artifacts uploaded to GEAR (summer 2015) consisted of an in-depth assessment of artifacts that instructors aligned to the following outcomes as <u>primary</u>: *Intercultural Thinking* (due to sampling error, five of the alignments for *Intercultural Thinking* were secondary), *Ethical and Civic Thinking*, and *Communication Fluency*. One hundred eight artifacts were included for each outcome, resulting in a total of 324 artifacts. This sample resulted in higher numbers for each outcome trait. Results from summer 2015 suggested a need to redesign rubrics to be continuous, rather than categorical, in nature.

Finally, assessment data from 2013-2014 and 2014-2015 showed that Marshall's students improved their writing skills as they moved through the curriculum and, specifically, as they passed from 100/200 level writing intensive courses to 300/400 level writing intensive courses.

Procedures for 2016 Assessment

General Procedures

In summer 2016 we evaluated student artifacts produced in response to course assignments aligned to *Information Literacy, Integrative Thinking*, and *Metacognitive Thinking* that were uploaded to GEAR during academic year 2015-2016. Students enrolled in First Year Seminar (FYS), and courses with Critical Thinking (CT) and Writing Intensive (WI) designations uploaded artifacts aligned to these outcomes. It was possible for a single assignment to align to any number of outcomes and traits. However, we asked instructors to specify the <u>primary</u> outcome to which the assignment aligned and all artifacts chosen randomly for assessment had indicated that the outcome in question was the <u>primary</u> outcome for the assignment/artifact. Although we have asked instructors teaching courses that have <u>only</u> multicultural (MC) or international (INT) designations to upload artifacts whose primary learning outcome is *Intercultural Thinking*, a small number of MC courses specified one of this cycle's outcomes as primary and were drawn for this sample.

In May 2016 a group of nine faculty representing several academic colleges from across the university evaluated a sample of these artifacts using outcome specific rubrics. These rubrics which, as noted above, were revised prior to scoring, are included in the supporting documentation. Our sample initially consisted of 324 artifacts, 108 per outcome. However, during scoring we discovered that one artifact, *aligned* to *Integrative Thinking*, had been uploaded twice (once in PDF and once in Word format). The second was eliminated, leaving 107 artifacts aligned to *Integrative Thinking*. This resulted in a total of 323 unique artifacts in this sample. Each artifact was read by two independent reviewers. This project was coordinated by the Office of Assessment.

Scoring Procedures

Evaluators assessed each artifact using the following scale:

	Special Scoring Codes							
Score	Explanation							
100	In the opinion of the evaluator, the artifact was misaligned with the outcome/trait to which the instructor or student had tagged							
	it.							
99	The student did not upload the correct assignment or there was a technical problem with the upload that prevented the artifact							
	from being assessed.							
	Regular Scoring Codes							
These co	des were given to artifacts that, in the opinion of the evaluator, were aligned with appropriate outcomes/traits and contained							
enough i	nformation to allow assessment.							
0	The artifact did not demonstrate the minimum level of performance expected at the introductory level.							
1	The artifact demonstrated introductory level performance.							

2	The artifact demonstrated milestone level performance.
3	The artifact demonstrated capstone level performance.
4	The artifact demonstrated advanced level performance.

Please see the supporting information that follows this summary for a detailed explanation of scoring procedures.

General Information about the Sample

One hundred seventy-one (171; 53%) of the artifacts in our sample were drawn from courses at the 100/200 level, with the remaining 152 (47%) drawn from courses at the 300/400 level. Thirty-seven (37%) percent of the students in the sample were freshmen, 15% were sophomores, 14% were juniors, and 33% were seniors.

Results and Analysis

One challenge in reporting results of GEAR assessment is that, although we assessed 323 artifacts, results were analyzed by each outcome trait. As previously noted, instructors or students were free to align assignments/artifacts to as many (or as few) outcomes and traits as they deemed appropriate. Although we assessed each artifact for only one outcome (which the instructor or student had designated as its *primary* outcome), most of these artifacts aligned to more than one of the outcome's traits. The total number of traits across the three outcomes was 10 (4 each for *Information Literacy* and *Integrative Thinking*, and 2 for *Metacognitive Thinking*). A perusal of our supporting documentation shows that the artifacts evaluated by the Assessment Workgroup tagged to a total of 606 traits. However, scores for only 442 (73%) of those traits were usable for calculating means. One hundred sixty-four (164) were discarded either because they were judged not to align with the traits (128; 21%) or were not able to be assessed because of student upload or other type of error (36; 6%). The chart below shows the number of artifacts aligned to each trait, the number excluded from the analysis due to receiving scores of 100 (misalignment) or 99 (student upload or other error), and the resulting number of scores able to be used for the analysis of means.

Outcome	Trait	Total Traits Aligned	# Misaligned (Scores of 100)	# Not Able to be Assessed (Score of 99)	Total # Excluded from Analysis of Means	Total Usable Traits
Information	Sources	59	11	9	20	39
Literacy	Relevance of Information	97	19	8	27	70
	Assumptions and Biases	33	12	2	14	19
	Citation	40	4	5	9	31

Integrative Thinking	Connections among Disciplines	91	24	2	26	65
	Relations among Domains of Thinking	32	8	2	10	22
	Transfer	32	7	0	7	25
	Connections to	82	16	3	19	63
	Experience					+
Metacognitive	Project Management	40	13	2	15	25
Thinking	Self-Evaluation	100	14	3	17	83
Totals		606	125	36	164	442

Results for *Information Literacy* showed that the mean score for the trait *citation* was significantly higher for students in 100/200 level courses than for those in 300/400 level courses. However, we had usable scores for only 9 students from 300/400 level courses as compared to usable scores for 22 students in 100/200 level courses. *Information Literacy* means did not differ significantly based on course level for any other trait; trait means also did not differ significantly based on class rank (freshman/sophomore compared to junior/senior). Students enrolled in courses at the 300/400 levels had significantly higher means for *Integrative Thinking*: connections among disciplines than did students enrolled in 100/200 level courses. Course level mean differences were not significant for any other trait of *Integrative Thinking* (note: there were no 300/400 level artifacts tagged to *domains* and only one tagged to *transfer*). Juniors and seniors also scored significantly higher than freshmen and sophomores in *Integrative Thinking*: connections among disciplines. For *Metacognitive Thinking*, mean differences did not differ based on course level, but freshmen and sophomores outperformed juniors and seniors on *Metacognitive Thinking*: self-evaluation.

Overall results showed mean performance for traits to range from 1.44 (*Integrative Thinking*: relations among domains of thinking) to 2.45 (*Information Literacy:* relevance of information). Mean performance for artifacts uploaded from freshmen and sophomores ranged from 1.32 (*Integrative Thinking*: connections among disciplines) to 2.4 (*Information Literacy:* relevance of information) and for juniors and seniors from 1.58 (*Integrative Thinking:* transfer) to 2.52 (*Information Literacy:* relevance of information). The overall strength for students in this sample was *Information Literacy:* relevance of information, while the overall weakness was *Integrative Thinking*.

Results for Course Type

Analyzing results by course type posed several challenges. First, the only course type that is unique, i.e. can have only one course type attribute, is First Year Seminar (FYS). Courses can have the other attributes (Critical Thinking [CT], Multicultural [MC], International [INT], Writing Intensive [WI], and Service Learning [SL]) in combination (and many do). So, when analyzing results by course type, we included all courses with the attribute we wanted to assess; this resulted in some courses being included in the analysis for more than one course type. Because the number of courses with MC and INT attributes in our sample was small, we did not conduct analyses of these course types. We also note that MC and

INT courses have been asked to create assignments and ask students to upload artifacts whose primary alignment is to *Intercultural Thinking*, an outcome we did not assess this cycle. SL courses (which align to *Ethical and Civic Thinking*) were not included in our sample this year.

Critical Thinking (CT) Courses

CT courses in the assessment sample included those that aligned to each of the outcomes assessed: *Information Literacy, Intercultural Thinking,* and *Metacognitive Thinking.* All CT courses are at the 100/200 level. Results are below:

Information Literacy			Integrative Thinking			Metacognitive Thinking		
Trait	Number	Mean Score	Trait	Number	Mean Score	Trait	Number	Mean Score
Sources	6	2.67	Connections among Disciplines	16	1.36	Project Management	7	1.79
Relevance of Information	6	2.71	Relations among Domains of	14	1.55	Self- Evaluation	6	1.42
			Thinking			Evaluation		
Assumptions and Biases	4	2.63	Transfer	15	1.83			
Citation	4	3.50	Connections to Experience	27	1.72			

These results must be interpreted with caution, as /n/s are small. However, it appears that students in CT courses performed better on *Information Literacy* than on *Integrative and Metacognitive Thinking*. We note that all CT courses are at the 100 and 200 levels.

First Year Seminar (FYS) Courses

FYS courses in the assessment sample included those that aligned to each of the outcomes assessed: *Information Literacy, Intercultural Thinking,* and *Metacognitive Thinking.* FYS is, by definition, at the 100 level. Results are below:

Information Literacy			Integrative Thinking			Metacognitive Thinking		
Trait	Number	Mean Score	Trait	Number	Mean Score	Trait	Number	Mean Score
Sources	22	2.16	Connections among	8	1.31	Project	7	2.36
			Disciplines			Management		
Relevance of	20	2.35	Relations among	8	1.25	Self-	36	2.29
Information			Domains of			Evaluation		
			Thinking					
Assumptions	4	2.25	Transfer	9	1.44			
and Biases								

ĺ	Citation	18	2.03	Connections to	12	1.33		
				Experience				

Most artifacts from FYS courses included in our sample aligned to *Metacognitive Thinking*: self-evaluation and to three of the four traits of *Information Literacy*. Strongest performance was in *Metacognitive Thinking* and *Information Literacy*.

Writing Intensive (WI) Courses

WI courses in the assessment sample aligned to all outcomes assessed: *Information Literacy, Intercultural Thinking,* and *Metacognitive Thinking*. Results are given below by course level for *Information Literacy*:

Trait	Course Level	Number	Mean Score
Sources	100/200	0	
	300/400	11	2.45
Relevance of Information	100/200	2	2.50
	300/400	44	2.46
Assumptions and Biases	100/200	0	
	300/400	11	1.86
Citation	100/200	0	
	300/400	9	1.22

All but two artifacts from WI courses aligned to *Information Literacy* in our sample came from courses at the 300/400 levels. With the exception of *Information Literacy*: relevance of information, /n/s were low. Performance was stronger for "sources" and "relevance of information" than for the other two traits. However, performance in these 300/400 level courses does not appear to be significantly better than performance of students from 100/200 level FYS and CT courses.

WI results are given below by course level for *Integrative Thinking*:

Trait	Course Level	Number	Mean Score
Connections among Disciplines	100/200	6	1.79
	300/400	39	2.35
Relation among Domains of	100/200	8	1.59
Thinking	300/400	0	
Transfer	100/200	10	1.70
	300/400	0	
Connections to Experience	100/200	18	2.03
	300/400	19	2.00

Our sample did not contain any artifacts from WI courses that aligned to "relation among domains of thinking" or "transfer" at the 300/400 levels. On the other hand, a relatively large number (39) artifacts from 300/400 level WI courses aligned to "connections among disciplines" and 19 aligned to "connections to experience." The number of artifacts from WI courses at the 100/200 level was relatively small for each trait, with

the largest being 18 that aligned to "connections to experience." There was essentially no difference in the mean scores for "connections to experience" based on course level. Students in 300/400 level courses did perform better than those in 100/200 level courses in "connections among disciplines," but the latter had a relatively small /n/(6).

WI results are given below by course level for *Metacognitive Thinking*:

Trait	Course Level	Number	Mean Score
Project Management	100/200	5	1.90
	300/400	7	1.96
Self-Evaluation	100/200	5	2.20
	300/400	37	1.77

Although it appears that the mean score for WI courses from 100/200 level courses for "self-evaluation" was higher than that for courses from 300/400 level courses, only five artifacts from the former aligned, while there were 37 from the latter.

Misalignments

It is difficult to discern if misalignments occurred more often based on course type due to the differing /n/s in each case. We refer the reader to the supporting documentation for additional detail.

Conclusion

Strongest performance among this group of students was for *Information Literacy*: relevance of information, while the weakest performances were scattered among the traits of *Integrative Thinking*. Of concern remains the number of assignments (and hence, student artifacts) that the Assessment Workgroup judged to not align to the *Outcomes*: traits to which they were tagged. Results for course type mirrored those of the overall analysis.

Recommendations from the 2016 Assessment Workgroup

Recommendations Concerning the General Process of Assignment Creation and Accurate Alignment to University Outcomes

We first note that, beginning with academic year 2016-2017, faculty will be asked to develop assignments that align to the outcomes as stated in Marshall University's Baccalaureate Degree Profile. In other words, we will abandon the former practice of asking instructors to indicate which performance level on the rubric they used when creating assignments. The reason for this decision is that the former rubric level descriptions were essentially different outcome statements. The Assessment Workgroup began the process of redeveloping the rubrics so that performance

levels now specify *how well* each student demonstrates mastery of the university's *outcomes*, not whether or not the student achieves progressively more complex outcomes. Outlined below are concerns and recommendations from the Assessment Workgroup.

- 1. A major concern among the members of the Assessment Workgroup was the large number of assignments/artifacts that the Workgroup judged to be misaligned to the outcomes/traits to which they were tagged. Several recommendations were made to improve this situation. These included:
 - Work with faculty to create assignments that align with the university outcomes addressed in Critical Thinking (CT), First Year Seminar (FYS) and Writing Intensive (WI) courses during the faculty development sessions that prepare instructors to teach these courses, as follows:
 - Center for Teaching and Learning for CT courses
 - Center for Teaching and Learning in conjunction with the Director of FYS for FYS courses
 - o Center for Teaching and Learning in conjunction with the Director of Writing across the Curriculum for WI courses
 - Identify model assignments from those already uploaded to GEAR and create a repository of these assignments. This repository can function as both a resource for faculty developing new assignments and a teaching tool during faculty preparation to teach the aforementioned course types.
 - Ask the Center for Teaching and Learning to consider offering faculty development sessions focusing on alignment of assignments to Marshall University's outcomes.
 - Ask the General Education Council to require that all CT, INT, and MC courses include the assignment that will be used for general education assessment (i.e. GEAR upload) in course application and renewal materials and to explain explicitly how this assignment addresses the university outcome/trait to which it is aligned.
 - Ask that each assignment created with student artifacts uploaded into GEAR include an explicit explanation from the instructor as to how the assignment addresses the university outcome/trait(s) to which it is aligned.
 - Members of the Assessment Workgroup will submit a proposal for a session to be presented at the August 2016 iPED: Inquiring Pedagogies Conference. The purpose of this session will be to overview the general education assessment process and findings, and to discuss with faculty the importance of careful assignment alignment to university outcomes.
- 2. To reduce the number of artifacts from the assessment pool that must be discarded due to the Assessment Workgroup's judgment that the assignment itself does not align to the university outcome to which it was tagged, the Assessment Workgroup recommended that, in future, it <u>evaluate</u> each assignment for accuracy of alignment <u>before</u> the sample of artifacts is selected.

Recommendations regarding Marshall's Transition from GEAR to Blackboard Outcomes for Assessing Student Work

Marshall will begin to use Blackboard Outcomes for general education assessment during academic year 2016-2017. This will have some advantages over GEAR, but will pose some challenges as well. Advantages will include:

- 1. Faculty will have to create an assignment and align it to university outcomes only once <u>if</u> the assignment and alignment is completed in their master course shell. Unless something changes, i.e. assignments are changed or updated, once alignments are made in Blackboard, they will simply be copied the next time the course is offered.
- 2. Faculty will ask students to submit artifacts for the aligned assignment using the assignment module in Blackboard Learn. This will allow the faculty member to assess the artifact for course grading purposes and the student and faculty member will need to do <u>nothing</u> else to support university assessment. For the latter purpose, Blackboard Outcomes will make a copy of the artifact (which will not include any instructor grading or comments, i.e. it will be a *clean* copy) for later assessment.
- 3. As is the case with GEAR, when artifacts are randomly chosen for assessment in Blackboard Outcomes, course information will not be available to assessors.

Blackboard Outcomes also presents challenges. These include:

1. Faculty will align assignments to a university outcome and assessors will use that outcome's rubric, which will include all of the outcome's traits. Because not all assignments will align to every trait of the outcome, instructors will have to indicate in their assignment instructions (and/or explicit explanation regarding alignment) the traits to which the assignment aligns.

To help facilitate the transition from GEAR to Blackboard Outcomes, the following plans are in place.

- 1. Marshall's Baccalaureate Degree Profile outcomes have been entered into Blackboard.
- 2. Several faculty teaching FYS, Anthropology, and Sociology courses during summer 2016 will create assignments and align them to University outcomes within Blackboard. They will use the Blackboard assignment tool and the Office of Assessment will set up artifact collection through Blackboard Outcomes. The Office of Assessment will test the Blackboard Outcomes assessment process at the end of the summer.
- 3. Fall 2016 will be a semester set aside to prepare faculty to begin using Blackboard as an artifact repository for assessment purposes. To facilitate this process, the following steps will be taken:
 - The Office of Assessment will administer a survey to all faculty teaching FYS, CT, WI, MC, INT, and SL courses. The survey will ask a series of questions that will allow us to divide the group into three cohorts (seasoned Blackboard users who routinely use the Blackboard assignment tool, Blackboard users who have not used the assignment tool, non-Blackboard users).
 - After the survey has been completed, the Assessment Office will develop three online tutorials, one geared to each group of faculty identified above.
 - The Office of Assessment also will work with the Center for Teaching and Learning, the MU Design Center, and the Associate Vice President for Libraries and Online Learning to develop a schedule of training sessions for each cohort of faculty.
- 3. During spring 2017, our hope is that all faculty teaching general education courses will begin to use Blackboard for assignment creation and student artifact collection. They will have access to the online tutorials and to training sessions as they did during the fall semester.

Appendix XXII Oral Communications Assessment Report

1

Component Area Assessment Annual Report Oral Communication Component Area 2015-2016 Academic Year

Submitted by:
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Assessment Criteria

Component Area Goals

After completing the oral communication general education experience, students will be able to:

- Recognize communication as a transactional process by:
 - a. determining audience orientation toward a message
 - b. identifying the supporting material most relevant to the intended receivers
 - c. recognizing and adjusting to nonverbal feedback
- Demonstrate critical thinking in both the production and evaluation of spoken messages by:
 - a. identifying reasoning that links observations to conclusions
 - b. understanding the limitations of different types of evidence
 - c. differentiating between various types of supporting evidence
 - d. identifying weaknesses in reasoning
- 3. Produce organized informative and persuasive messages by:
 - a. demonstrating the ability to capture audience attention
 - b. stating a thesis and previewing oral remarks
 - c. using signposts and transitions to clarify the organization of a message
 - d. concluding with a summary of main ideas or arguments
- Demonstrate effective extemporaneous speaking skills by:
 - a. maintaining eye contact with intended receivers
 - b. using gestures which complement the verbal message
 - c. using varied vocal cues in the oral delivery of a message

Learning Outcomes

Outcome 1: Recognizing communication as a transactional process by a) determining audience orientation toward a message; b) identifying the supporting material most relevant to the intended receivers; and c) recognizing and adjusting to nonverbal feedback.

This outcome is practiced through students' preparation outlines and speech proposals, in which they describe their preparation activities. They discuss their audience analysis activities and relate that analysis to the selection of organizational patterns, arguments, and supporting material. The assessment criteria for examining sample speeches focuses on audience adaptation as a basis for determining the competency of the speaker. All eight assessment criteria are used as a basis for determining the competency of the speaker on this outcome.

Outcome 2: Demonstrating critical thinking in both the production and evaluation of spoken messages by a) identifying reasoning that links observations to conclusions; b) understanding the limitations of different types of evidence; c) differentiating between various types of supporting evidence; d) identifying weaknesses in reasoning.

The focus on critical thinking in the course is reflected in all assignments, especially the preparation outlines, speeches, and self-analysis assignments. The assessment criteria for examining sample speeches focuses on the following criteria as a basis for determining the competency of the speaker: choosing and narrowing a topic appropriately for audience and occasion; communicating the thesis/specific purpose in a manner appropriate for the audience and occasion; providing appropriate supporting material based on the audience and occasion; and, using language that is appropriate to the audience and occasion.

Outcome 3: Producing organized informative and persuasive messages by a) demonstrating the ability to capture audience attention; b) stating a thesis and previewing oral remarks; c) using signposts and transitions to clarify the organization of a message; d) concluding with a summary of main ideas or arguments.

This outcome is practiced through students' preparation outlines and speech proposals, in which they describe their preparation activities. Most importantly, students learn how to use different organizational patterns for various types of speeches in the course. The structural elements of persuasive speaking are evident in speech performances. The assessment criteria for examining sample speeches focuses on the following criteria as a basis for determining the competency of the speaker: communicating the thesis/specific purpose in a manner appropriate for the audience and occasion; and, using an organizational pattern appropriate to the audience and occasion.

Outcome 4: Demonstrating effective extemporaneous speaking skills by a) maintaining eye contact with intended receivers; b) using gestures which complement the verbal message; c) using varied vocal cues in the oral delivery of a message.

The development of extemporaneous speaking skills is one of the most important goals of this course. Students' competencies in maintaining eye contact, using gestures, and employing vocal variety are directly observable in their speech performances. The assessment criteria for examining sample speeches focuses the following criteria as a basis for determining the competency of the speaker: using vocal variety in rate, pitch, and intensity to heighten and maintain interest; using pronunciation, grammar, and articulation appropriate to the audience; and using physical behaviors to support the message.

4

Method

Sample

For the fall and spring semesters, a total of 860 persuasive speech videos were loaded to the Ensemble system. A priori power analysis and pragmatic time constraints resulted in a selected sample of 266 speech videos (\pm 5%, 95% CI) for analysis. Random sampling for the selection of speech videos was used, wherein the team selected every third speech video after an arbitrary starting point, selected via a random number generator. When the video was inaudible or corrupted, the team simply shifted to the next video and resumed with the pattern of selecting every third video. With this sampling method, a relatively even distribution between fall (n = 121) and spring (n = 145) was accomplished. Moreover, all uploaded sections had four to six videos sampled.

Procedure

The assessment team consisted of the basic course director and a long-time term instructor. Together, the team has over 25 years of teaching oral communication courses and both have participated in previous assessments. The team was created with a desire to have rigorous perspectives represented within the assessment process. The team met during June 2016 to conduct the assessment. The first session focused on training. The team reviewed the instrument, discussed definitions and criteria, and practiced assessing speeches. The team then coded a separate sample and attained 95% agreement on the ratings detailed below.

Although the team sat together for the assessment process, each of the videos was evaluated individually. When unsure of how to assess an element of a speech, team members would have a brief discussion and reach consensus. The totals for each team member were loaded into Excel; the results of individual assessments were not significantly different. A score for each facet and the overall speech was then averaged and tabulated into a group score. Group scores are reported below.

Measures

The National Communication Association's "Competent Speaker Speech Evaluation Form" was used as the main assessment tool. This form operationalizes eight criteria of effective speaking competencies. The eight criteria call on speakers to: 1) choose and narrow topic appropriately for the audience & occasion; 2) communicate the thesis/specific purpose in a manner appropriate for the audience and occasion; 3) provide appropriate supporting material based on the audience and occasion; 4) use an organizational pattern appropriate to the audience and occasion; 5) use language that is appropriate to the audience and occasion; 6) use vocal variety in rate, pitch, and intensity, to heighten and maintain interest; 7) use pronunciation, grammar, and articulation appropriate to the audience, and 8) use physical behaviors that support the verbal message.

The eight criteria were rated as unsatisfactory (1) or satisfactory (2). During the training meeting, the team discussed the assessment instrument and normed on definitions of unsatisfactory and

satisfactory. It was agreed that unsatisfactory translated to a speech that would earn a D or F on the facet being assessed. A satisfactory mark translated to an A, B, or C grade on that facet.

Results

Across the two raters, an average for each of the eight elements was calculated for each speech. An overall averaged total score for each speech across the two raters was also calculated. These scores were then analyzed in terms of the student learning outcomes associated with this course.

Eight Assessment Criteria

The eight criteria were rated as unsatisfactory (1) or satisfactory (2). Average ratings across the two coders were calculated. Topic selection (M= 1.92, SD= .24); pronunciation, grammar, and articulation (M=1.90, SD= .23); and use of language appropriate to the audience and occasion (M= 1.90, SD= .23) were the three highest-rated criteria. Vocal variety, pitch, and intensity (M= 1.79, SD= .35); organizational pattern appropriate to the audience and occasion (M= 1.70, SD= .37); and, physical behaviors that support the verbal message (M= 1.65, SD= .41) were all also satisfactory in the aggregate. The criteria with average ratings that were the lowest were: providing appropriate supporting material (M= 1.63, SD= .42); and, communicates a thesis/specific purpose in a manner appropriate for the audience and occasion (M= 1.57, SD= .46).

Overall Ratings for Speeches

An overall summated rating for each speech was calculated based on scores for the eight criteria. The score given by each rater was then averaged. Scores could range between 8 and 16. An established minimum score of 11.5/16 (71%) on the eight criteria was determined as minimally competent. Average summated ratings ranged from 8.00 to 16.00, with an average summated score of 13.98 (SD= 1.64). Overall, 247 of the 266 speeches sampled scored 11.50 or higher. This translates to 92.80% of the speeches passing the benchmark.

Assessment of Learning Objectives

Recognize public speaking as transactional. Criteria detailed in the "Competent Speaker Speech Evaluation Form" were used to evaluate benchmarks on student learning outcomes. The first learning outcome for students is to recognize public speaking as a transactional process. This course outcome has been assessed with the average score on all the criteria. The expectation is a minimum benchmark score above 11.50 (71%). The speeches averaged better than the minimal expectation (M= 13.98, SD= 1.64). Overall 235/266 speeches scored above 11.50, which means approximately 88.34% of speeches met this course outcome.

Demonstrate critical thinking. The second learning outcome is to demonstrate critical thinking in both the production and evaluation of spoken messages. This course outcome has been assessed with the average score on critical thinking exam questions. The decision was made this past year to eliminate exams. Therefore, this year's critical thinking outcome is assessed on the following criteria from the speech assessment tool: chooses and narrows a topic appropriately for audience

and occasion; communicates the thesis/specific purpose in a manner appropriate for the audience and occasion; provides appropriate supporting material based on the audience and occasion; and, uses language that is appropriate to the audience and occasion. The minimum benchmark is a score of 6.00/8.00 (75%). The average summated score for this year's sample was 6.95 (SD= 1.40). Overall, 233 of the 266 speeches scored at or above 6.00. This translates to approximately 88% of the speeches passing this benchmark.

Produce organized messages. The third learning outcome is to produce organized and informative persuasive messages. This course outcome was assessed with the average score on the following criteria: communicates the thesis/specific purpose in a manner appropriate for the audience and occasion and uses an organizational pattern appropriate to the audience and occasion. The minimum benchmark is a score of 3.00/4.00 (75%). The average summated score for this year's sample was 3.27 (SD= .83). Overall, 193 of the 266 speeches sampled scored over 3.00 on these two criteria. This translates to 72% of the speeches passing this benchmark.

Demonstrate effective extemporaneous speaking skills. The fourth learning outcome is to demonstrate effective extemporaneous speaking skills. The outcome has been assessed with the average score on three criteria: uses vocal variety in rate, pitch, and intensity to heighten and maintain interest; uses pronunciation, grammar, and articulation appropriate to the audience; and uses physical behaviors to support the message. The expectation is a minimum benchmark score of 4.50 (75%). Scores can range from 3.00 to 6.00. This year's speeches averaged a score significantly better than the benchmark (M= 5.15, SD= 1.08). Overall, 217 of 266 speeches sampled scored over 4.50 on these three criteria. This translates to approximately 82% of the speeches passing this benchmark.

BOT Initiative 2. The assessment procedures described in this report are consistent with BOT Initiative 2. In particular, a randomly selected sample of student work in the oral communication component of the general education curriculum is reviewed to determine the level of competency in both oral communication and critical thinking. This year approximately 92% of student speeches reviewed met the minimum standard for competency in the course, and 8% failed to meet the standard.

Discussion

Last year's assessment demonstrated a variety of areas that needed attention and improvement in the course. In anticipation of these needs, the new basic course director revised all assignment guidelines and rubrics. Training and instruction for instructors was significantly increased during the past year. The new basic course director also provided additional resources and lesson plans for instructors. Teaching observations were conducted for new instructors and offered to all instructors. Feedback on teaching and guidance were increased. Finally, in-class examinations were eliminated and transitioned into online quizzes so that more instruction time could be dedicated to improving critical thinking and delivery skills.

The speeches sampled this year are a product of this new paradigm, especially new assignment guidelines and rubrics. The same standards for assessment established last year were continued in this term. The assessment team was rigorous in assessment of the persuasive speeches. Conservative estimations for hitting the desired benchmarks and identifying areas of needed improvement were preferred.

Results demonstrate that all criteria for assessing the speeches were satisfactory. Students were, on average, able to: choose and narrow topic appropriately for the audience & occasion; communicate the thesis/specific purpose in a manner appropriate for the audience and occasion; provide appropriate supporting material based on the audience and occasion; use an organizational pattern appropriate to the audience and occasion; use language that is appropriate to the audience and occasion; use vocal variety in rate, pitch, and intensity, to heighten and maintain interest; use pronunciation, grammar, and articulation appropriate to the audience, and use physical behaviors that support the verbal message. Below, each dimension is discussed in the order it scored in the assessment.

Topic selection, a major issue in previous years, was the highest scoring dimension this year. A change was made in the course this past year that required student to select civic persuasive speech topics. Choosing topics of social importance helped make the topics appropriate for the audience and promote civic thinking in the course. Instructors were also asked to help students narrow topics appropriately and this work was evident in the speeches given by students in this sample.

Verbal dimensions associated with delivery were all satisfactory. Topic selection likely influenced the formality of language used in positive ways. A new dimension to verbal delivery, argumentative tone, was added to the rubric and stressed in class sessions. This inclusion arguably increased vocal variety, pitch, and intensity ratings from previous assessments. That said, the incorporation of oral citations seemed to decrease pronunciation ability as some students had not practiced enough to fluently communicate about specific authors (last names proved problematic at times).

Physical behaviors that support the verbal message were also satisfactory in the aggregate; there is, however, plenty of room for improvement. A major difference was noted between students using notecards and paper outlines. Instructors were asked to limit the number of notecards students could prepare or limit the paper outline to one page. When the notecards were limited

students had the best physical behaviors. When students were limited to one-page outlines, some did very well. Having too many notes for the presentation was associated with unsatisfactory physical behaviors. Podium use helped contribute to satisfactory delivery in students with paper outlines. Use of clickers to advance PowerPoint slides was also overall beneficial.

The appropriateness of information is often influenced by topic selection. Therefore, guiding topic selection helped improve the appropriateness of information. Additionally, a new requirement of 5 oral citations in the persuasive speech helped increase the quality of the information provided. Although it was one of the most difficult concepts for students to grasp in the course and required a significant amount of course instruction time, the inclusion of oral citations from high-credibility sources significantly improved the quality of the speeches. That said, there is still needed improvement on this dimension that will be discussed below.

Organizational pattern options for students were also narrowed, which likely helped to improve scores on this dimension. Students were advised to use a problem-solution format for these persuasive speeches. While it helped structure the speeches in terms of organizational pattern, it may have negatively influenced the generation of thesis statements (further discussed below).

Finally, communicating a thesis/specific purpose was the lowest rated criteria. Although technically satisfactory, the assessment team was not pleased with the majority of the thesis statements presented in the persuasive speeches. We believe the problem with this sample's thesis statements may have come from using the problem-solution organizational pattern. Whereas an appropriate thesis statement for a persuasive speech is an argument that tells the audience who should do what to solve a problem, too many of the sampled thesis statements were "X issue is a serious problem." While appropriate for an informative speech seeking to raise awareness, this format is not an appropriate thesis for a persuasive speech. Below means for remedying this issue are discussed.

Overall, the majority of the speeches (92%) met the minimum benchmark score. This represents a 53% increase in speeches meeting the benchmark from the previous year.

These criteria were used to assess successful completion of the learning outcomes. In this sample, approximately 88% of the students met the first learning objective of recognizing public speaking as a transactional process. Overall, 88% percent demonstrated critical thinking in both the production and evaluation of spoken messages. About 72% of students were able to meet learning objective three by producing organized persuasive messages. Finally, 82% percent of students met the minimum benchmark for demonstrating extemporaneous speaking skills.

Action Plan

The assessment results show significant improvements in a variety of areas. These results also identify areas of needed improvement. Planned steps to improve our ability to exceed assessment criteria and accomplish learning outcomes are detailed below.

First, the course will adopt a new textbook and online platform. Starting this fall, all sections will use "Public Speaking: The Evolving Art" (3rd Ed.) by Stephanie Coopman and James Lull. This

textbook is accompanied by Cengage's Mindtap online platform. This textbook was chosen after an extensive review of public speaking textbooks for its balance of traditional public speaking instruction and innovative variations on core themes of oral communication. The textbook is arguably more accessible and appropriate for our student body, as many of our students did not have public speaking instruction as part of their secondary education. It also costs significantly less than our previous textbook, even with the addition of the online platform.

Cengage's Mindtap seamlessly integrates into Blackboard for easy use by instructors and students. It provides a more personalized learning experience to students and we hope it will better prepare them for class sessions and major assignments. Mindtap also has a variety of features that increase accessibility for students with disabilities. Students will be asked to complete the reading and a quiz or short activity before coming to class. It is hoped that by allocating points to the reading quizzes and activities, students will be better prepared for an activities-based classroom. These activities should increase delivery skills and critical thinking outcomes.

After being totally redesigned last year, all assignments are being significantly revised this summer. Guidelines and specific rubrics will still be included for each speech. Instructors are asked to spend instructional time reviewing the guidelines and rubrics at length. We will continue our new practice of not including in-class examinations after seeing significantly better results in our assessment data. Finally, a new major assignment, an invitational dialogue, is being added to increase critical thinking skills and delivery fluency.

To help students determine more appropriate and narrow topics for speeches (Criterion 1), the course now features a civic thinking component. Students are asked to find civic problems of interest as a dialogue and persuasive speech topic. This was piloted in the last year and worked extremely well. We will continue this practice in the coming year.

To improve the quality of thesis statements (Criterion 2), a variety of approaches will be taken. New supplementary materials on crafting thesis statements will now be included. Specifically, we will be incredibly explicit about the use of the "Who should do what" argumentative format of a persuasive thesis. Perhaps some instructors were confused last year, so time in training and a new module on our organizational course site will be added on persuasive arguments and thesis statements. Instructors will be instructed to dedicate one class period to discussing each student's thesis statement in class.

To improve the quality of the supporting material (Criterion 3), we will make some additions to last year's curriculum. We will continue to require five oral citations from high quality sources. Students practice creating these oral citations with a proposal and then place them in the speech by crafting a preparation outline. We will also continue to work with our research librarian, Sabrina Thomas, to further develop the new research guide for CMM 103, which provides guidance for finding sources and information literacy. Ms. Thomas also hosts a session for CMM 103 instructors on teaching information literacy. We will seek to provide more examples for students and encourage students to seek out assistance with their oral citations from the Writing Center and instructors.

To improve the organization of speeches (Criterion 4), students will use the Outline Builder tool in Mindtap. The rubrics now allocate more points on organizational elements and insist on transitions throughout the speech. Class activities focusing on organization have also been added as options for instructors. The new textbook presents organizational patterns in a more straightforward manner and offers some innovative activities to learn about how different organizational patterns can be used.

To improve language choices (Criterion 5), a new class activity on language choices was designed for instructors. Points on the persuasive speech are now allocated for "argumentativeness" that is operationalized as language choice and tone. Instructors will be encouraged to use an entire class session in the persuasive speech unit to teach and practice argumentative tone.

We are still exploring ways to improve delivery. Currently delivery is assessed through: vocal variety in rate, pitch, and intensity (Criterion 6); pronunciation, grammar, and articulation (Criterion 7); and physical behaviors that support the verbal message (Criterion 8). Instructors have been asked to spend more class time working with students on delivery. New exercises to improve delivery have been added to the class repository. Mindtap includes more example speeches that focus on delivery elements for student to view. Mindtap also includes a practice speech-recording device called "YouSeeU." All students will be required to upload a practice session prior to presenting their speech to a live audience. Finally, assignment guidelines will be changed to require use of notecards (instead of paper outlines) and limit the number of notecards students can use for the presentation.

A few general steps have also been taken to improve our delivery of the course. First, an instructor-only course section was created on Blackboard last fall. This instructor space creates an opportunity to share information like lesson plans, video examples, and activities. We are creating a repository for best practices and central mechanism for information dissemination. The instructor organizational course site will continue to grow and offer more resources for faculty.

We have also incorporated more training for all instructors. Cengage has conducted two sessions on using Mindtap and will have orientations for instructors and students in the fall. Classroom observations of all first-year graduate students will continue to be conducted. Finally, we believe the new textbook with an online platform will allow us to spend more instructional time for experiential learning. We also believe this change will allow more infrastructure and more support for instructors, especially new graduate teaching instructors. Overall, a major goal is to spend more instructional time working with students on speech construction and delivery.

Assistance Needed

Continued funding for reviewers to conduct the assessment in summer is necessary.

Summary Table

Outcome	Method of Assessment	Standard	Evaluation	Action Plan
Recognize public speaking as a transactional process	Review of student speeches for competence.	Minimum score of 11.50/16 on the 8 relevant criteria.	88% of speeches passed	Revised speech assignments to stress importance of audience.
Demonstrate critical thinking in both the production and evaluation of spoken messages	Review of student speeches for competence.	Minimum score of 6/8 (75%) on 3 relevant criteria.	88% of speeches passed	New class activities and revised speech assignments stress critical thinking application.
3. Produce organized informative and persuasive messages	Review of sample student speeches for competence.	Minimum score of 3/4 (75%) on 2 relevant criteria.	72% of speeches passed.	Focus on teaching thesis statements as explicit arguments that tell audience who should do what.
4. Demonstrate effective extemporaneous speaking skills	Review of sample student speeches for competence.	Minimum score of 4.5/6 (75%) on 3 relevant criteria.	82% of speeches passed.	Require students to use a restricted number of notecards during presentation.

Appendix XXIII English Core II Assessment Results

RESULTS OF COMPOSITION PROGRAM ASSESSMENT, SPRING 2014 Total Number of Artifacts Assessed: 269

Traits	Below	Introductory	Milestone
Trait #1: Position themselves within public conversation	Gradorit accomot pocition		Student's position is present and relevant to the discussion in the paper.
	N=29 (11%)	N=117 (43%)	N=123 (46%)
Trait #2: Compose a logical argument supported by research	Student does not have an argument OR does not support argument by research.	•	Student's argument is supported with research and is mostly logical; research is generally relevant.
	N=61 (23%)	N=115 (42%)	N=93 (35%)
Trait #3: Attend to issues of audience, purpose and rhetorical context	Does not show evidence of considering audience, purpose, and/or rhetorical context.	Shows evidence of some thought about audience, purpose, and/or rhetorical context	Shows evidence of some facility with at least two of the following: audience, purpose, rhetorical context.
	N=45 (17%)	N=137 (51%)	N=86 (32%) Plus 1 rated "Capstone"

COMPOSITION PROGRAM ASSESSMENT RESULTS, AY2014-15 Number of Artifacts: 193 Fall, 247 Spring, 440 Total

Outcome #3: Ability to work with different texts as researchers, to mine for information, and to effectively use research sources, including online sources, in their writing.

Traits	Below	Introductory	Milestone
Trait #1: Work with different texts as researchers	Paper lacks source variety in terms of type and timeliness of sources used; writing may rely too heavily on one source for evidence.	writing reflects average awareness of	Writing is supported by a sophisticated variety of appropriate sources.
	Fall: 67 (35%) Spring: 89 (36%) AY Total: 156 (35%)	AY Total: 209 (48%)	Fall: 33 (17%) Spring: 42 (17%) AY Total: 75 (17%)
Trait #2: Mine for information	Source selection seems based on convenience rather than appropriateness; paper lacks credible sources.	relevant sources but may still lean heavily on general internet sources and other questionable material. Fall: 96 (50%)	demonstrating student's ability to locate relevant scholarly material. Fall: 35 (18%)
	Fall: 62 (32%) Spring: 79 (32%) AY Total: 141 (32%)	Spring: 126 (51%) AY Total: 222 (50%)	Spring: 42 (17%) AY Total: 77 (18%)
Trait #3: Effectively use research sources in their writing.	Quotes, paraphrases, and summaries of sources are used inappropriately or not at all.	Writing demonstrates some knowledge of proper source attribution and appropriateness to the context but consistent errors may be present in source citation.	Writing demonstrates sophisticated use of source usage and correct citation in nearly every circumstance.
	Fall: 73 (38%) Spring: 91 (37%) AY Total: 164 (38%)	Fall: 102 (53%) Spring: 133 (54%) AY Total: 235 (53%)	Fall: 18 (9%) Spring: 23 (9%) AY Total: 41 (9%)

Other Notes and Comments

- 1. Some artifacts were unreadable (wrong format, blank document, etc.). In those cases, the artifacts were discarded and replaced with new ones
- 2. Other artifacts were missing Works Cited or were otherwise incomplete. The faculty assessed those as best they could; in future semesters, students may need to be reminded to upload complete work.

ENG 201 ASSESSMENT RESULTS, AY 2015-16

NOTE: Due to differences in the rubrics used in AY2015-15 and AY2015-16, comparative data are available only for the "Research" trait.

For AY 2015-2016, we are basing our program assessment on Marshall University's degree profile learning outcome for <u>communication fluency</u> since composition makes up six hours of students' general education requirements. As such, we are assessing students' writing in ENG 201 to determine if our program is preparing students appropriately for this outcome. See http://www.marshall.edu/assessment/LearningOutcomes.aspx for more information regarding Marshall's learning outcomes for its baccalaureate degree programs.

Learning Outcome: Students will develop cohesive oral, written, and visual communications tailored to specific audiences.

Traits/Levels	Below	Introductory	Milestone	
Organization	Organization is weak and often	Identifies and uses basic organizational	Applies key design/organizational principles in	
	impedes meaning.	principles.	communication.	
	Fall 2015: 78 (48%)	Fall 2015: 76 (46%)	Fall 2015: 10 (6%)	
	Spring 2016: 66 (34%)	Spring 2016: 109 (56%)	Spring 2016: 19 (10%)	
	AY: 144 (40%)	AY: 185 (52%)	AY: 29 (8%)	
Diction	Chooses incorrect vocabulary that fails	Chooses rudimentary vocabulary that	Chooses vocabulary that conveys the writer's	
	to convey the writer's meaning.	conveys the writer's intended meaning.	intended meaning.	
	Fall 2015: 36 (22%)	Fall 2015: 115 (70%)	Fall 2015: 13 (8%)	
	Spring 2016: 29 (15%)	Spring 2016: 132 (68%)	Spring 2016: 33 (17%)	
	AY: 65 (18%)	AY: 247 (69%)	AY: 46 (13%)	
Communication	Errors are multiple and obstruct the	Communication has only a few errors in	Communication is virtually free of mechanical,	
Style	writer's intended meaning.	style, mechanics, or other issues that	stylistic or other issues that might distract from	
		might distract from the message.	the message.	
	Fall 2015: 58 (35%)	Fall 2015: 94 (57%)	Fall 2015: 12 (7%)	
	Spring 2016: 47 (24%)	Spring 2016: 119 (61%)	Spring 2016: 28 (14%)	
	AY: 105 (29%)	AY: 213 (60%)	AY: 40 (11%)	
Research	Quotes, paraphrases, and summaries	Demonstrates adequate knowledge of	Demonstrates sophisticated use of source usage	
	of sources are used inappropriately or	proper source attribution and	and correct citation in nearly every circumstan	
	not at all.	appropriateness to the context.		
	Fall 2014: 73 (38%)	Fall 2014: 102 (53%)	Fall 2014: 18 (9%)	
	Spring 2015: 91 (37%)	Spring 2015: 113 (54%)	Spring 2015: 23 (9%)	
	AY: 164 (39%)	AY: 215 (51%)	AY: 41 (10%)	
	Fall 2015: 83 (51%)	Fall 2015: 71 (43%)	Fall 2015: 10 (6%)	
	Spring 2016: 67 (35%)	Spring 2016: 100 (52%)	Spring 2016: 27 (14%)	
	AY: 150 (42%)	AY: 171 (48%)	AY: 37 (10%)	

Appendix XXIV Library' Information Literacy Assessment Report: Academic Year 2014-2015

Information Literacy Assessment 2014-2015

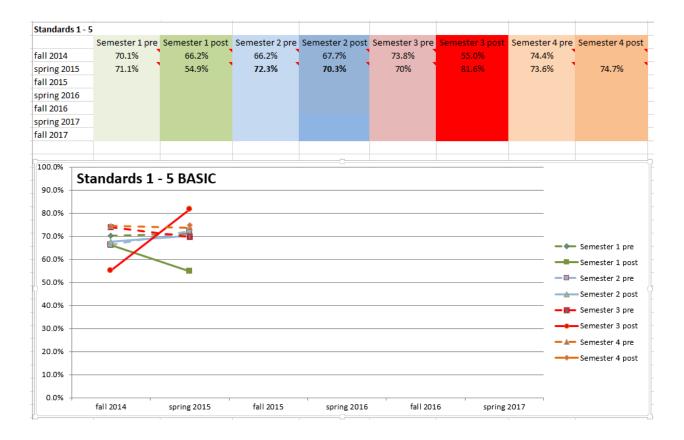
The Information Literacy Assessment (ILA) is composed of two parts, each with two assessment points. The BASIC is for general education students. First semester freshmen are assessed to establish the baseline, and forth semester sophomores are assessed to measure general education IL skills. Part two of the assessment is the CAPSTONE, which is administered to fifth semester juniors to establish a baseline score, and to eighth semester seniors. In reality, it is difficult to impossible to assess at each of these four optimal points. Instead, we assess in classes that are willing and have time to take an in-class assessment. As a result, the sample of 185 students assessed during the 2014/15 academic year represents students at all course levels. In order to analyze the results, a determination was made as to the semester each student was in at the time the assessment was taken. This information was obtained through BERT. The results were plotted by semester.

In an attempt to achieve randomness, entire classes were assessed. Unfortunately, adequate randomness was not achieved. Since the classes tended to be associated with various disciplines, noticeable score differentials showed up from class to class. For example, One FYS 100 class was filled with freshmen in the Computer Forensics and Quality Assurance program. The majority of these *freshmen* scored 70% and above on the *Pre-Test*, which is given before IL instruction is offered. Another FYS 100 class was taught by a librarian. The average score for the eight second semester *Post-Tested freshmen* in this class was 78%. These classes skewed the results for the BASIC ILA upward.

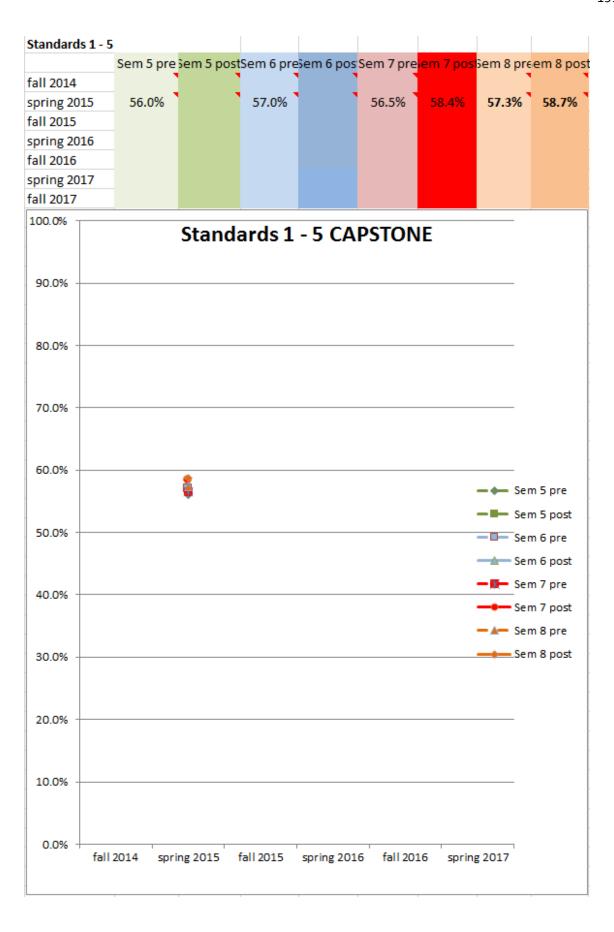
The CAPSTONE assessment was given in two capstone classes. One was Communication Disorders and the other Computer Sciences. The scores averaged about 50%. Nevertheless, seniors who were tested in other classes tended to score higher. The low results in Communication Disorders and Computer Sciences skewed the results for the CAPSTONE downward. What this shows is that students who major in disciplines that are not integrated with the library tend not to achieve scores as high as programs that integrate with the library and information literacy instruction. These results provide additional support to something long known to librarians, that the more students are required to use library resources, the higher their information literacy attainment.

The following pages show tables and graphs that indicate average scores for the BASIC and CAPSTONE ILA. It is important to note that results are recorded by semester. A 4 post result shows forth semester sophomore post-test scores (not senior level scores). The ILA BASIC graph shows little change in scores between pre- and post-tested students within any given semester, but the table shows an increasing trend in BASIC information literacy skills and knowledge from semester to semester. Due to the small numbers in some of the samples, validity of the results must be confirmed over time. Where ten or more students are represented, the percentage is in bold font. The average freshman is scoring 70% or better by the end of the

second semester and the average forth semester sophomore is scoring about 80% (out of a sample of only seven students). The Degree Qualifications Profile (DQP) requires that every student score 70% or better upon graduation.



The CAPSTONE chart on the next page has been stretched along the vertical access in order to differentiate the remarkably tight range of scores from fifth semester juniors to eighth semester seniors (regardless of pre- or post-testing). These scores are likely skewed downward because most come from only two classes, Communication Disorders and Computer Science, neither of which are integrated closely with the library. The eighth semester pre-test has a sample of ten students. The eighth semester post-test has a sample of forty students. Spring 2015 was the first semester in which the CAPSTONE was given.



Why are post-test results usually a little lower than pre-test results? Why are BASIC scores higher than expected in the second semester? Why do average scores show little movement from one semester to the next for the CAPSTONE ILA? These and other questions present themselves when the graphs are considered. Knowing the back story sheds light on these apparent anomalies. In a typical pre-test/post-test scenario, students are tested on a set of IL skills and principles, then they receive information literacy instruction which covers the items in the pretest. After the instruction is completed, they are post-tested. This methodology is not being used at Marshall. Librarians do not instruct to the test, therefore, many items on the BASIC and CAPSTONE versions of the ILA are not covered in any particular set of classes. The instruction may reference items in the IL Rubric, but is *not focused* on the rubric. Instead, librarians instruct to the needs of the class assignment and the particular research that students will be engaging in. This is done according to sound teaching practices that show students will not learn unless the instruction is relevant to them. The Information Literacy Rubric, to which the ILA is tied, covers ACRL Standards, which are a comprehensive list of IL skills, principles and learning outcomes. Library instruction usually covers some, but certainly not all, of the items in the IL Rubric. Preand post-test should be understood as pre- or post-instruction testing. Some classes are tested pre-instruction and other classes are tested post-instruction. No classes were pre- and post-tested.

Because there is no teaching to the test, it is not surprising that there is little, or sometimes negative, movement in the results between pre- and post-instruction testing. This lack of movement in the scores affirms that there is no teaching to the test. Test results, therefore, reflect what students actually know and can do. This also explains why the scores trend upward from semester to semester. Juniors and seniors scored, on average, 82.7% on the BASIC ILA (not shown on the graphs, but recorded on another document in this report. The upward trend in scores shows that students are learning information literacy in class, on their own and from friends and other sources until graduation. There is little doubt that homework assignments that require use of library resources are an important avenue to increase information literacy. This appears to be supported by relatively low CAPSTONE ILA scores in Computer Science and Communication Disorders. Those disciplines have not had active library liaison support in the past, and perhaps less need to integrate with library resources.

In order to increase ILA CAPSTONE scores, it will be important to understand which concepts and test questions are least understood. These should be addressed whenever possible, even in Gen. Ed. classes. Some BASIC ILA questions are included in the CAPSTONE ILA and vice versa. One question involves the procedure required to aggregate results to find useful articles on various topics of scientific research. Students must identify scholarly terminology used in the research they need, and place these terms in the *abstract field* of a search. This was the most missed question in the BASIC ILA. Interestingly, when twenty-two seniors took the CAPSTONE ILA as a pre-test, twenty-one of the students (95%) answered this question correctly. In the post-test, 70% of forty students answered correctly. This is probably the best unexpected result. Unfortunately, when capstone seniors were asked if they had ever set up an IDS (Inter-Library Loan) account, 63% had not. This probably indicates that they had no need because they were finding plenty of adequate information in the resources available to them. It also suggests that they are not bothering to find the *best* resources, in some cases.

The DQP requires an exit score of 70% on the ILA. On average, this has been achieved in the BASIC ILA, but not in the CAPSTONE, where pre- and post-test scores for seniors averaged 58.3%. *Seniors* who took the BASIC ILA scored 80.2%, on average. When BASIC and CAPSTONE results are averaged together, seniors are scoring 69.2%. Senior BASIC scores ought to be included in the final results since the entire IL Rubric should be mastered by graduation day.

Average scores show that the DQP minimum of 70% is almost being met. Unfortunately, a less positive picture emerges when we look at results student by student. Adding pre- and post-test results for the 4th semester BASIC ILA shows six students scored 70% and higher and two scored below 70%. In the CAPSTONE ILA, forty-five students scored below 70% and only five scored 70% or higher.

The following shows the number of students who scored below 70% and those who scored 70% or above on the BASIC pre/post-test in semesters 1-8. (A small sample of 8 students in the 4th semester indicates that 75% are achieving 70% proficiency or better on the BASIC IL Assessment. The sample is so small that pre- and post-test results have been averaged together.)

2014-2015 Academic Year BASIC

Pre-Test	(avg score below 70%)	(avg score 70% and above)
1 1↓ 2↑	63.6%	73.9%
2 7↓ 12↑	64.3%	76.2%
3 5↓ 3↑		
4 <mark>2↓ 5↑</mark>	66.1%	77.6%
5 0↓ 3↑		83.5%
6 0↓ 2↑		85.7%
7 1↓ 2↑	54.7%	93.3%
8 1↓ 6↑	64.1%	82.8%
Post-Test		
1 7↓ 5↑	54.5%	73.5%
2 21↓ 27↑	61.1%	76.4%
3 1↓ 2↑	66.9%	88.9%
4 <mark>0↓ 1↑</mark>		74.7%
5 0↓ 1↑		91.4%

6 0↓ 3↑	85.3%
7	
8	

2014-2015 Academic Year CAPSTONE

The following shows the number of students who scored below 70% and those who scored 70% or above on the CAPSTONE pre/post-test in semesters 1-8. (Results for Pre- and Post-test are almost identical. Adding them together we have a good sized sample of 50 students. Only 5 achieved a score of 70% or above, which is only 10% of the students.)

Pre-Test	(avg score below 70%)	(avg score 70% and above)
1		
2 0↓ 1↑		81.1%
3		
4		
5 1↓ 0↑	56.0%	
6 3↓ 1↑	52%	72.8%
7 5↓ 1↑	52%	76.8%
8 <mark>9↓ 1↑</mark>	61.7%	81.8%
Post-Test		
1 1↓ 0↑	40.94%	
2		
3		
4		
5		
6		
7 2↓ 0↑	58.4%	
8 <mark>36↓ 4↑</mark>	55.5%	73.6%

One way to raise these scores would be to take advantage of any opportunities that allow Instruction Librarians to cover frequently missed questions in class. These IL Rubrics show results for BASIC and CAPSTONE. Questions answered correctly <50% are in red; 50% <70% in yellow; $\geq 70\%$ in green.

Information Literacy (Adapted from the Information Literacy Value Rubric; AAC & U) BASIC

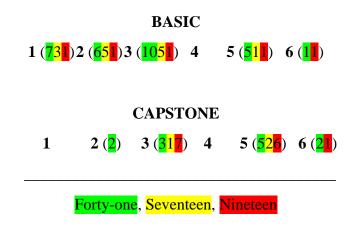
	Baseline (freshman)	Emerging (freshman and sophomore)	Acceptable (sophomore and junior)	Capstone Level (Exemplary) (senior)
Determines the Nature and Extent of the Information Needed	1.1. defines1 and articulates2 the need for information 1.1.c; 1.1.c	1.2. identifies1 a variety of types and formats of potential sources for information 1.2.c; 1.2.c; 1.2.c; 1.2.cd; 1.2.d;	1.4. evaluates5 and revises5 the nature and extent of the information need	1.3. assesses5 the costs and benefits of acquiring the needed information
Accesses the Needed Information Effectively and Efficiently	2.3. (selects3 and) retrieves (implements3 a retrieval of) information online or in person using a variety of methods 2.3.a; 2.3.a; 2.3.a; 2.3.c; 2.3.a	2.2. constructs6 and implements3 effectively-designed search strategies 2.2.d; 2.2.d	2.1. selects3 the most appropriate investigative methods or information retrieval systems for accessing the needed information 2.4. revises5 the search strategy if necessary.	2.3. retrieves (implements3 a retrieval of) information online or in person using a variety of methods 2.3.a;2.3.a 2.5. collects6 and arranges6 the information and its sources
Evaluates Information and its Sources Critically and Incorporates Selected Information into His or Her Knowledge Base and Value System	3.1. briefly describes2 the main ideas to be extracted from the information gathered 3.1.a	3.2. articulates2 and applies3 initial criteria for evaluating5 both the information and its sources 3.2.a; 3.2.a; 3.2.a; 3.2.a; 3.2.a; 3.7. determines5 whether the initial query should be revised 3.7.b;	3.3. synthesizes6 main ideas to construct new concepts. 3.4. compares5 new knowledge with prior knowledge to determine5 the value added, contradictions, or other unique characteristics of the information	3.5. determines5 whether the new knowledge has an impact on the individual's value system and takes steps to integrate6 differences 3.6. validates5 understanding and interpretation of the information through discourse with other individuals, subject-area experts, or practitioners
Individually, or as a Member of a Group, Uses Information Effectively to Accomplish a Specific Purpose	4.1. applies3 new and prior information to the planning and creation of a particular product or performance	4.1. applies3 new and prior information to the planning and creation of a particular product or performance	4.2. revises5 the development process for the product or performance	4.3. produces6/performs6 the product or performance effectively to others
Understands Many of the Economic, Legal, and Social Issues Surrounding the Use of Information and Accesses and Uses Information Ethically and Legally	5.3. identifies1 and reports2 the use of information sources in communicating the product or performance (5.2.f & 5.3);5.2.f	5.3. identifies and reports2 the use of information sources in communicating the product or performance	5.2. employs3 laws, regulations, institutional policies, and etiquette related to the access and use of information resources 5.2.f	5.1. evaluates5 and applies3 many of the ethical, legal and socioeconomic issues surrounding information and information technology

<u>Information Literacy (Adapted from the Information Literacy Value Rubric; AAC & U)</u> CAPSTONE

	Baseline (freshman)	Emerging (freshman and sophomore)	Acceptable (sophomore and junior)	Capstone Level (Exemplary) (senior)
Determines the Nature and Extent of the Information Needed	1.1. defines1 and articulates2 the need for information	1.2. identifies1 a variety of types and formats of potential sources for information	1.4. evaluates5 and revises5 the nature and extent of the information need 1.4;1.4;1.4;1.4	1.3. assesses the costs and benefits of acquiring the needed information 1.3.a;1.3.a
Accesses the Needed Information Effectively and Efficiently	2.3. (selects3 and) retrieves (implements3 a retrieval of) information online or in person using a variety of methods	2.2. constructs6 and implements3 effectively-designed search strategies	2.1. selects3 the most appropriate investigative methods or information retrieval systems for accessing the needed information 2.1.d;2.1.d;2.1.d;2.1.cd;2.1.cd;2.1.cd;2.1.cd;2.1.cd;2.2.d. revises5 the search strategy if necessary. 2.4.c	2.3. retrieves (implements3 a retrieval of) information online or in person using a variety of methods 2.3.c;2.3.d;2.3.a 2.5. collects6 and arranges6 the information and its sources 2.5.b
Evaluates Information and its Sources Critically and Incorporates Selected Information into His or Her Knowledge Base and Value System	3.1. briefly describes2 the main ideas to be extracted from the information gathered	3.2. articulates2 and applies3 initial criteria for evaluating5 both the information and its sources 3.7. determines5 whether the initial query should be revised	3.3. synthesizes6 main ideas to construct new concepts. 3.3.b;3.3.a 3.4. compares5 new knowledge with prior knowledge to determine5 the value added, contradictions, or other unique characteristics of the information 3.4.defg;3.4	3.5. determines5 whether the new knowledge has an impact on the individual's value system and takes steps to integrate6 differences 3.6. validates5 understanding and interpretation of the information through discourse with other individuals, subject-area experts, or practitioners 3.6
Individually, or as a Member of a Group, Uses Information Effectively to Accomplish a Specific Purpose	4.1. applies3 new and prior information to the planning and creation of a particular product or performance	4.1. applies3 new and prior information to the planning and creation of a particular product or performance	4.2. revises5 the development process for the product or performance	4.3. produces6/performs6 the product or performance effectively to others
Understands Many of the Economic, Legal, and Social Issues Surrounding the Use of Information and Accesses and Uses Information Ethically and Legally	5.3. identifies1 and reports2 the use of information sources in communicating the product or performance	5.3. identifies and reports2 the use of information sources in communicating the product or performance 5.3.a;(5.2.f&5.3);	5.2. employs3 laws, regulations, institutional policies, and etiquette related to the access and use of information resources 5.2.f;5.2.f	5.1. evaluates5 and applies3 many of the ethical, legal and socioeconomic issues surrounding information and information technology 5.1; (5.1&5.3f)

Bloom's Taxonomy Ranking

Verbs used in the IL Rubric are assigned a number which corresponds to the six columns in Bloom's Taxonomy of Higher Order Thinking. Looking at the numbers associated with questions highlighted in green, it is possible to see how the "passing" scores align with Bloom's. Red items are < 50% correct, yellow shows 50% < 70% green is $\ge 70\%$.



The ten most frequently missed questions on the BASIC ILA are:

3.7.b Revises the search strategy if necessary: You are researching the impact that wolves have on the environment. In your i... Multiple Choice(QS) 0.03 26.48% 68 2.65 4.45 0.54

You are researching the impact that wolves have on the environment. In your initial search query, you run a full-text search using the words wolves and environmental impact. You get thousands of hits, but after scanning the search results for about ten minutes, you find only one article that looks good for your paper. You read the abstract of this article and find that can lupus is used to refer to wolves and trophic cascades is a phrase used to refer to their impact on the environment. In order to find additional scholarly articles like this one, you decide to change the words of your initial search query to can lupus and trophic cascades. Which field should you search to obtain the best results?

full-text

title

abstract

subject

Incorrect Feedback

The abstract field of a scholarly article is a summary of the article, and it contains the most precise and relevant scholarly terminology. By rerunning your search in the abstract field using those scholarly terms, you are likely to find articles that not only use these terms, but articles that are primarily about the topic you are researching. What are some reasons why each of the other fields are unlikely to produce as good of results as a new search of the abstract field using scholarly terminology?

2.2.d Constructs a search strategy using appropriate commands for the information retrieval system: In an article by Bernie Becker in the New York Times, on 7/17/2010, West Virg...

Multiple Choice(QS) 0.32

29.42%

68

2.95

4.6

0.56

In an article by Bernie Becker in the New York Times, on 7/17/2010, West Virginia's governor, Joe Manchin III, announced on Friday that he had chosen.....to temporarily fill the Senate seat long held by Robert C. Byrd. To locate the desired information, go back to EBSCOhost MasterFILE Premier and enter the following search string:

"West Virginia" AND election* AND governor

Lisa Rickard

Shelley Moore Capito

Carte P. Goodwin

he did not make an interim appointment

Incorrect Feedback

It is cumbersome to find the correct article, but your task is simplified if you change the "Relevance" ranking to "Date Descending" on the blue bar directly above the first hit, then look for an article written on 7/17/2010. Can you think of a search strategy that includes none of the previously used terms and places the correct article at or near the top of the hits page?

1.1.c Beginning the research process: Your instructor has given you a general topic to research that you know nothi... Multiple Choice(QS) 0.09 68 3.68 4.86 36.77% 0.59

You have been instructed to study the topic and then write a research paper on one aspect of the topic that interests you. Instead of Googling the topic, what is the best first step you should take to begin your research and learn more about your assigned topic?

select one aspect of the topic that you wish to write about

find and read scholarly or professional journal articles about the topic

locate a reference source such as an encyclopedia or dictionary to read a short overview of the topic

find and read a book about the topic

Incorrect Feedback

Since you know nothing about the topic, it is very important to find and read a short overview that will provide you with the basics. Why is Wikipedia not the best choice to start your research given that it provides a short overview of your topic?

2.3.a Determines the availability of needed information: You will need to go to the Marshall University webpage and access the Library...Multiple Choice(QS) 0.2 52.95% 68

5.3 5.03 0.61

You will need to go to the Marshall University webpage and access the Library site. (Go to ACADEMICS> LIBRARIES> ALL ARTICLE DATABASES> EBSCOhost> MasterFILE Premier to answer this next question). You are looking for an article called "Economic Lessons from Across the Pond." How can you get a copy of this entire article for free?

Use the EBSCOHost MasterFILE Premier "E-mail" feature to email the article to yourself

3.2.a Articulates and applies initial criteria for evaluating information and its sources: The WND Books press is non-biased. (Go online to help make your selection) True/False(QS)

0.47

52.95% 68 5.3 5.03 0.61

The WND Books press is non-biased. (Go online to help make your selection)

False

Incorrect Feedback

Bias does not imply error. However, it does indicate that certain agendas are being pursued and that information will be viewed from a perspective that supports these agendas. When using biased sources, it is a good idea to seek balance by researching information presented by authors with different points of view and different biases. It is easier to find information in the hard sciences that is not biased, but the soft sciences are prone to bias because they deal with social issues. Can you think of ways in which the hard sciences are biased?

1.2.cd Identifies the value and differences of potential resources in a variety of formats: Your professor wants you to find at least one peer-reviewed article. What is ... Multiple Choice(QS)

0.51 60.3% 68 6.03 4.93 0.6

Your professor wants you to find at least one peer-reviewed article. What is a peer-reviewed article?

an article that was critically assessed by scholars in the field prior to publication

an article that was critically assessed by scholars from a variety of fields prior to publication an article that an editor looked over for grammatical errors prior to publication an article in a non-scholarly newspaper or magazine

Incorrect Feedback

The editor removes the name of the author from a manuscript and sends it to three or more scholars in the same field to review and provide feedback prior to publication. This feedback is forwarded on to the author. Peer reviewers do not know the author and the author does not know the identity of the reviewers. Peer reviewers will make a recommendation to the editor whether or not the article is scholarly and ought to be published. This process ensures that a high level of confidence and trust may be placed in articles that are selected for publication. Can you think of an example where the peer review process could break down and not work as it is intended to work?

5.2.f Employs laws, regulations, institutional policies and etiquette related to information: What is a citation? Multiple Choice(QS) 0.34 60.3% 68 6.03 4.93 0.6

What is a citation?

a list of keywords

a quotation from a reference to a book, paper, or author, especially in a scholarly work

the identifying elements of a source

a short summary of a book or article

Incorrect Feedback

A citation identifies source materials. If you do not identify the source materials that you use, this is called plagiarism. Plagiarism occurs whenever you misrepresent the work of others as your own. Apart from avoiding plagiarism, what other reasons can you give for why it is important to use citations?

1.1.c Explores general information sources to increase familiarity with the topic: Reference materials are designed to provide users with quick facts, brief ove... Multiple Choice(QS)

0.44 61.77%

68

6.18 4.9

0.6

Reference materials are designed to provide users with quick facts, brief overviews, or intermediate information on a given topic. Libraries use databases to house information. Databases are typically collections of searchable related information. With this in mind, reference books and reference databases typically contain

authoritative articles on topics (examples include dictionaries and encyclopedias)

articles from websites (examples include WebMD and MayoClinic.com)

non-scholarly information

very lengthy articles that provide in-depth information

Incorrect Feedback

Reference resources provide a scholarly overview of a topic. They introduce you to key concepts, dates, individuals and other facts. Unlike Wikipedia, you may cite the reference resources provided by the library because the authors are authoritative and the publishers are reputable. Can you give one or more examples of a reference source?

2.3.b Retrieves information online or in person using a variety of methods.: The majority of books in this and most other academic libraries are arran... Multiple Choice(QS) 0.4

61.77%

68

6.18

4.9

0.6

The majority of books in this and most other academic libraries are arranged by what classification system?

Dewey Decimal System

Library of Congress Classification

Taxonomic Classification System

Esperanto Classification System

none of the above

Incorrect Feedback

Most colleges and universities use Library of Congress Classification, so, for the most part, books are arranged the same way in all of them! Even though the LCC system is based upon a taxonomy, this particular one is called Library of Congress Classification. Only a small number

of our books use the Dewey Decimal System, such as the juvenile book collection. When books are arranged in a certain order, they are referred to as a "book collection." Without this special arranging of the books, it would not be a collection, but merely a bunch of books. What reasons can you come up with for why it would be advantageous to arrange books the same way everywhere?

3.1.a Briefly describes the main ideas to be extracted from the information gathered: Where is the best place to identify the main ideas of an article? Multiple Choice(QS) 0.42

61.77%

68

6.18

4.9 0.

Where is the best place to identify the main ideas of an article?

article subject terms

title

table of contents

abstract

Incorrect Feedback

Although the main ideas might be found in any of the choices provided, the abstract is always the best place to look because it is a summary of the contents of an article or book. Abstracts are written to provide the most important information, including main points, scholarly terminology, important people and dates, etc. Do you think the other choices provided as possible correct answers to this question complement the information that is found in an abstract? Why or why not?

The ten most frequently missed questions on the CAPSTONE ILA are:

2.1.c Investigates the scope, content, and organization of information retrieval systems: You have to find firsthand accounts of the 9/11 attack in New York City. Whic... Multiple

Choice 0.13 27 9194 43 2.8 4.54 0.7

Choice 0.13 27.91% 43 2.8 4.54 0.7

You have to find firsthand accounts of the 9/11 attack in New York City. Which of the following sets of sources would give you the best results?

Historical Abstracts, Academic Search Premier, CQ Researcher

America: History and Life, JSTOR, Project MUSE

CQ Researcher, Historical Abstracts, Credo Literati Reference

LexisNexis Academic, Academic Search Premier, Google

Incorrect Feedback

LexisNexis includes newspapers from around the world as well as transcripts of broadcast news. Academic Search Premier includes, not only journals, but magazines and newspapers. One newspaper story from 9/17/2001 is called "'Daily News' scribe on the spot tells the story." MU Libraries' online catalog will help you to find books and e-books with eye-witness accounts such as "Until the fires stopped burning: 9/11 and New York City in the words and experiences of survivors and witnesses." Would you prefer to seek eye-witness accounts in the newspaper or in a book? Why?

1.3.a Determines the availability of needed information: You will need to go online and access Academic Search Premier to answer this ... Multiple Choice 0.3 30.24% 43 3.03 4.65 0.71

You will need to go online and access Academic Search Premier to answer this next question. You are looking for an article called "Sovereign Debt Threatens the Union: The Genesis of a Federation." How can you get a copy of this article for free?

EZ Borrow

IDS/Interlibrary loan

Academic Search Premier "E-mail" feature, to email the article to yourself

Search MU Summon

Incorrect Feedback

This particular article may be "located" by searching Academic Search Premier (ASP), but it cannot be "accessed." Therefore, ASP's "E-mail" option will not provide access to this article. The only means available to you is to receive it via email by placing an order through IDS/Interlibrary loan. Selecting "Search MU Summon" is also an excellent choice to find the article, but it is not accessible through Summon. What are some advantages to a library using a digitally based product like IDS (Information Delivery Service) rather than traditional interlibrary loan using paper documents?

1.4 The Extent of the Information Need: You have almost completed a research paper for a sociology class. Another stu... Multiple Answer 0.22 32.56% 43 3.26 2.77 0.43

You have almost completed a research paper for a sociology class. Another student just introduced you to a library database that probably would have been much better for you to use because of the number of journals that focus on your topic. You have other classes needing your attention, and you are torn over whether or not you should investigate this new resource and

gather additional information for your research paper. Indicate which of the following would be among your best approaches.

Research is never finished. It is important to know about every good database and to incorporate the information I find into my paper.

It depends. I might if I think it could make a big improvement to my research paper.

The Writing Center tutor told me my paper was not supported by enough evidence because I only cited two sources. I will look for additional articles in the database that I just found out about.

My paper is well documented, so I am not going to look into the new database now. I will look into it when writing my next paper.

Incorrect Feedback

It is okay to draw the line and conclude that your research is complete.

1.4. Information Formats: Information may be found in various formats and media including sound, print ... Multiple Choice 0.33 37.21% 43 3.73 4.9 0.75

Information may be found in various formats and media including sound, print (doc, pdf, Excel, etc.), graphics, journal articles, books, artifacts, photographs, etc. Imagine that you are preparing a research paper about the contributions of women to the war effort in World War I. You found only a few articles for your research, so you are interested in all of the information you can find on the subject, regardless of its format. How can you find every type of material accessible through the library?

Search Summon

Search Google Scholar

Search the Library Catalog

Search LibGuides

Incorrect Feedback

Summon is known as a web scale discovery system. It searches everything in the library as well as everything that the library has access to in its database holdings on the Internet. Can you think of any library databases that allow you to search for information in a number of formats?

2.3.c Retrieves information online or in person using a variety of methods: You have already setup an IDS (Information Delivery Services) account. True/False 0.26 37.21%

43 3.73 4.9 0.75

You have already setup an IDS (Information Delivery Services) account.

True

False

Incorrect Feedback

In what ways is IDS better than previous inter-library loan systems?

3.4.defg Testing Hypotheses Using Appropriate Techniques: Scarification on the backs of some tribal members in Africa represents owners... Multiple Answer 0.41 39.54%

43 3.96 2.52 0.39

Scarification on the backs of some tribal members in Africa represents ownership and tilling of land. Tattoos on U.S. bikers often indicate membership in a bikers club. You suspect that both of these groups mark their bodies in the way they do in an effort to improve their sense of selfworth. Which of the following techniques might be appropriate for you to use to test your hypothesis?

find scholarly articles about similar studies about why Canadians get tattoos

survey Marshall University students to ask why they decided to get tattooed

survey tattoo artists for their opinions as to why people get tattooed

correlate your hypothesis with the scholarly article "Piercing among adolescents: Body art as risk marker."

correlate your hypothesis with the scholarly article "Native American tattoos: Identity and spirituality in contemporary America."

1.4 Identifying Primary and Secondary Sources: Determine which of the following items are primary, secondary, or possibly both. Matching -0.02 43.8% 43 4.38 2.5 0.39

Determine which of the following items are primary, secondary, or possibly both.

letters, interviews and surveys primary

biographies secondary

300 year old book primary or secondary

a photocopy of a primary source document primary

documentaries secondary

journal articles primary or secondary

Incorrect Feedback

Journal articles could be primary or secondary. All research articles are primary, but review articles, which provide a synopsis of the current state of research in a field, are secondary. Can you think of a situation where you would be better off using review articles rather than research articles?

2.1.c Investigates benefits and applicability of various investigative methods: You are looking for credible biographical information for a research paper ab... Multiple Choice 0.03

44.19%

43

4.42

5.03

0.77

You are looking for credible biographical information for a research paper about Eleanor Roosevelt. Which of the following would give you the best results?

Google

Credo Literati

Wikipedia

ERIC

Incorrect Feedback

You can find credible biographical information about Eleanor Roosevelt by using Google, Wikipedia and ERIC. Credo Literati is the best resource to use. Why is this the case?

2.5.b Creates a system for organizing information: Which of the following techniques would be an easy and effective way to organ... Multiple Choice 0.39 44.19% 43 4.42 5.03 0.77

Which of the following techniques would be an easy and effective way to organize information that is in a digital format? (PDF, .doc, .rtf, .xls, mp3, etc.)

create citations for each item

use a cloud-based information management tool such as Zotero

use the saved items folder in Summon and other databases

use the mindmap in Credo Literati

Incorrect Feedback

Zotero and EndNote may be the most popular tools to organize and store digital information. Folders and subfolders can be created in an outline form for all of the information you find for your research. Zotero is free and stores/organizes all of your information in the cloud so you may access it from any computer that is online. Zotero also allows you to create customized descriptors (tags) for every item saved. Zotero automatically records bibliographic (citation) information for each item saved. Create your own free Zotero account. Go to www.zotero.org and click on "Register" on the top right of the screen. The library search engine, Summon, allows you to save and export the information you wish to use, but unlike a cloud based system, Summon does not save your search results once you exit the system.

1.4. Identification of Primary and Secondary Source Material: You are required to cite five primary and five secondary sources in a paper t... Matching 0.22 44.66% 43 4.47 2.04 0.32

You are required to cite five primary and five secondary sources in a paper that you are writing. Indicate whether the following statements are true or false.

a source cannot simultaneously be primary and secondary false

a primary source cannot turn into a secondary source over time true

a secondary source cannot turn into a primary source over time false

the determination of whether a source is primary or secondary could be influenced by the type of research that I am doing true

an original paper document, such as the Constitution of the United States, becomes secondary source material when it is retrieved online false (a mistake was found in this question when gathering stats. This question shows "true" as the correct answer; however, the correct answer is "false."

Incorrect Feedback

Copies of important original documents like the Magna Carta are considered to be primary sources. Scholars researching the restoration or preservation of original documents would consider copies of those documents to be secondary sources in light of the special requirements of their research.

Where do we go from here? Without a doubt, several options will present themselves to improve IL concepts and skills learned by Marshall students.

Embed librarians in classes wherever possible.

Run the ILA in classes that have students with a diversity of majors, such as English classes.

Pre-test first semester freshmen during week one in the fall to determine the baseline score.

Run only the post-instruction test after the baseline score is determined.

Run ILA post-instruction in the spring to capture more 4th and 8th semester stats (target 4th semester Gen Ed classes for the post-test).

95% of graduating seniors score 70% or better on the Basic Assessment. Capstone results are dismal, with only 10% of graduating seniors scoring at least 70%. It is important that opportunities arise to teach Capstone skills and concepts in lower division classes in order to improve the Capstone Assessment by graduation day.

Concentrate on inserting instruction that focuses on the 20 most missed questions when possible.

Ask instructors to integrate library resources in student assignments and coursework.

Systematically contact new faculty to interest them in working more closely with the library and integrating library resources into their assignments.

We could try "teaching to the test" to see if this would be beneficial. It may be difficult to find classes where it would be advisable to do this.

Appendix XXV NSSE Report Comparing Engagement in Co-Curricular Activities between first generation and non-first generation students.



Marshall University

Your Results

Selection Criteria

Survey administration(s): 2009, 2010, 2011, 2012 Selected Student Characteristics Class level: All first-year students

Time Spent on Various Activities by First-Generation Status

		Not Fi Genera		First- General		Total	
		N	%	N	%	N	%
About how many hours do you spend in a typical 7-day week doing each of th	ne following?						
Participating in co-curricular activities (organizations, campus publications, student government,	0 hrs	261	40	410	56	371	48
fraternity or sorority, intercollegiate or intramural sports, etc.)	1-5 hrs	197	30	157	22	354	26
	6-10 hrs	79	12	56	8	135	10
	11-15 hrs	52	8	42	6	94	7
	16-20 hrs	32	5	27	4	59	4
	21-25 hrs	20	3	15	2	35	3
	26-30 hrs	5	1	6	1	11	1
	More than 30 hrs	11	2	14	2	25	2
	Total	657	100	727	100	1,384	100

Appendix XXVI

Analysis of Marshall's Performance on the Broad Areas of Learning of the Lumina Foundation's *Degree Qualifications Profile (DQP*): Combined Data from Marshall's Institutional Test of the *DQP* and Marshall's Performance on the *National Survey of Student Engagement (NSSE)* from 2010 - 2012

Summary of Important Findings

- 1. Areas of the DQP to which the fewest programs reported alignment as part of Marshall's test of the DQP were
 - Civic Learning (31 out of 92 programs; 34% did not align)
 - Quantitative Fluency (25 out of 92 programs; 27% did not align)
 - The intellectual skills of Engaging Diverse Perspectives (24 out of 92 programs; 26% did not align)
- 2. Comparison of student responses to NSSE questions that map to the DQP's Broad Areas of Learning show that:
 - Relative areas of strength are the intellectual skill of analytic inquiry (seniors and freshmen) and specialized knowledge (seniors)
 - Relative area of weakness is *civic learning* (seniors and freshmen). *Engaging Diverse Perspectives* also was relatively weak for seniors (of 12 *NSSE* items mapping to *Engaging Diverse Perspectives*, seniors has high positive responses to three and high negative responses to two. On the other hand, freshmen had high positive responses to four items and high negative responses to only one).
 - NSSE did not show Quantitative Fluency to be a weakness for seniors or for freshmen.
- 3. Freshmen have steadily improved on these items since 2010:
 - Made a class presentation (Active and Collaborative Learning)
 - Worked on a paper or project that required integrating ideas or information from various sources
 - Put together ideas or concepts from different courses when completing assignments or during class discussion
 - Used an electronic medium (listserv, chat group, Internet, instant messaging, etc.) to discuss or complete an assignment (Enriching Educational Experiences)
 - Coursework emphasized: Synthesizing and organizing ideas, information, or experiences (Level of Academic Challenge)
 - Coursework emphasized: Making judgments about the value of information, arguments, or methods (Level of Academic Challenge)
- 4. When analyzing freshman and senior performance on *NSSE* questions that map to the *DQP*'s Broad Areas of Learning, students showed strength on the following items (refer to chart and note that items are prefaced by these stems):
- 1 = In your experience at your institution during the current school year, about how often have you done each of the following?
- 2 = During the current school year, how much has your coursework emphasized the following mental activities?
- 7 = Which of the following have you done or do you plan to do before you graduate from your institution?
- 11 = To what extent has your experience at this institution contributed to your knowledge, skills, and personal development in the following areas?

NSSE Question #	NSSE Benchmark	DQP Areas of Learning	NSSE Question	% Freshmen Responding Positively			% Seniors Responding Positively			
				2010	2011	2012	2010	2011	2012	
1d	None	Specialized K Broad, Integ K Applied L	Worked on a paper or project that required integrating ideas or information from various sources	82	<mark>87</mark>	91	88	<mark>87</mark>	<mark>89</mark>	
2b	Level of Academic Challenge	Specialized K IS: AI IS: UIR IS: EDP IS: CF Applied L	Analyzing the basic elements of an idea, experience, or theory, such as examining a particular case or situation in depth and considering it components	78	79	86	88	85	84	
7a	Enriching Educational Experiences	IS: EDP Applied L Civic L	Practicum, Internship, field experience, co-op experience, or clinical assignment	78	78	83	82	85	83	
7b	Enriching Educational Experiences	Applied L Civic L	Community service or volunteer work	75	75	<mark>83</mark>	74	77	75	
7h	Enriching Educational Experiences	Specialized K Applied L	Culminating senior experience (capstone course, senior project or thesis, comprehensive exam, etc.)	68	62	66	<mark>90</mark>	<mark>91</mark>	<mark>92</mark>	
11a	None	Broad, Integ K IS: All Applied L Civic L	Acquiring a broad general education	82	80	<mark>85</mark>	84	83	82	
11c	None	Specialized K Broad, Integ K IS: CF Applied L Civic L	Writing clearly and effectively	82	79	<mark>86</mark>	76	77	81	
11d	None	Specialized K Broad, Integ K IS: CF Applied L	Speaking clearly and effectively	77	74	83	71	73	76	
11e	None	Specialized K Broad, Integ K IS: All Applied L Civic L	Thinking critically and analytically	<mark>86</mark>	83	90	<mark>89</mark>	<mark>85</mark>	87	
11f	None	IS: QF	Analyzing quantitative problems	72	72	<mark>80</mark>	74	72	76	
11g	None	Specialized K IS: UIR	Using computing and information technology	<mark>82</mark>	77	<mark>82</mark>	<mark>82</mark>	<mark>83</mark>	79	

5. When analyzing freshman and senior performance on *NSSE* questions that map to the DQP's Broad Areas of Learning, students showed weakness on the following:

NSSE Question #	NSSE Benchmark	DQP Areas of Learning	NSSE Question % Freshmen Responding % Seniors Responding Positively			Positively			
				2010	2011	2012	2010	2011	2012
1b	Active and Collaborative Learning	Specialized K IS: UIR IS: QF IS: CF Applied L	Made a class presentation	40	57	55	60	60	64
1k	Active and Collaborative Learning	Applied L Civic L	Participated in a community-based project (e.g. service learning) as part of a regular course	13	13	16	15	18	20
1u	Enriching Educational Experiences	IS: EDP IS: CF Civic L	Had serious conversations with students of a different race or ethnicity than your own	47	<mark>46</mark>	56	53	53	<mark>47</mark>
7d	Student Faculty Interaction	Broad, Integ K Applied L	Worked on a research project with a faculty member outside of course or program requirements	36	35	38	34	34	39
7e	Enriching Educational Experiences	IS: UIR IS: CF	Foreign language coursework	51	<mark>45</mark>	<mark>47</mark>	<mark>50</mark>	51	51
7f	Enriching Educational Experiences	Applied L	Study abroad	<mark>33</mark>	31	<mark>29</mark>	<mark>20</mark>	23	22
7g	Enriching Educational Experiences	Broad, Integ K Applied L	Independent study or self-designed major	<mark>22</mark>	17	17	<mark>27</mark>	<mark>25</mark>	<mark>30</mark>
11i	None	Civic L	Voting in local, state, or national elections	<mark>26</mark>	<mark>28</mark>	<mark>34</mark>	<mark>32</mark>	<mark>29</mark>	<mark>27</mark>
111	None	Broad, Integ K IS: EDP Applied L Civic L	Understanding people of other racial and ethnic backgrounds	56	56	64	52	<mark>47</mark>	52
110	None	Civic L	Contributing to the welfare of your community	<mark>42</mark>	<mark>43</mark>	<mark>48</mark>	<mark>43</mark>	<mark>38</mark>	<mark>39</mark>

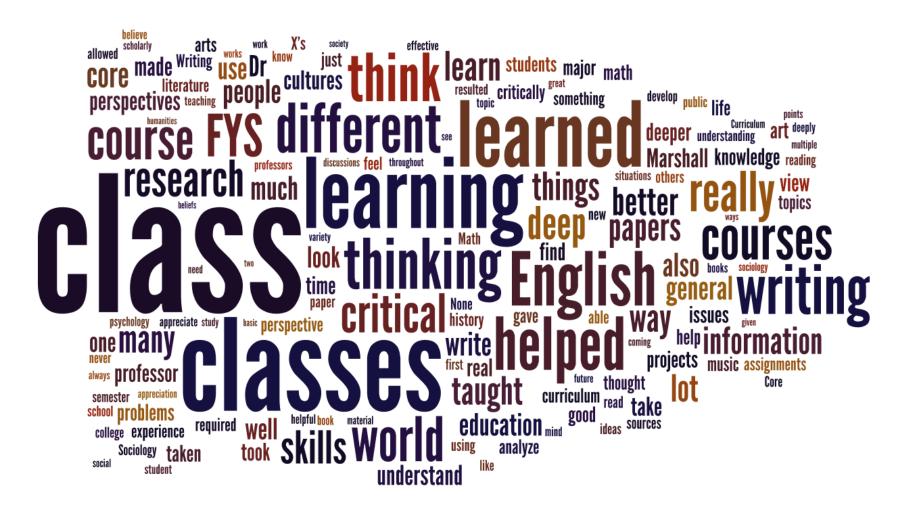
Also note that, since 2010, Marshall's freshmen have improved significantly in the *NSSE* benchmarks, *Level of Academic Challenge* and *Active and Collaborative Learning*. See "Multiyear Benchmark Comparison Report" at http://www.marshall.edu/assessment/surveydata.htm

Thought for Consideration

Develop a plan to incorporate service learning more widely across the curriculum.

Appendix XXVII

Wordle Showing Most Frequently Used Words in Response to the Survey Item, "Please provide examples of practices in your Core Curriculum (general education) courses that have resulted in deep learning."



Appendix XXVIII

Academic Year 2014-2015 Graduation Survey Results Executive Summary: Please visit www.marshall.edu/assessment/SurveyReports.aspx for complete reports.



2014-2015 Graduation Survey Data Summer and Fall (2014) and Spring (2015) Marshall University

Office of Assessment and Program Review

- These data are for academic year 2014 2015. Unless otherwise noted, all findings are essentially unchanged since academic year 2013 – 2014.
- Overall response rate was 32% (558 respondents out of 1,717 graduates) up from 28% in 2013-2014.
- Females were more likely than males to respond to the survey.
- Students who completed Bachelor's Degrees were more likely to respond than were students who completed Associate's Degrees.
- The Mean GPA of respondents (3.22) was significantly higher than that of all graduates (3.14), but the effect size was small.
- Response rates differed significantly across colleges. The College of Arts and Media had the highest response rate (44%) and the College of Health Professions the lowest (24%). - in 2013-2014 response rates did not differ among colleges.
- Respondents did not differ from the cohort in terms of race and age.

- Most respondents were single with no children, were WV residents, and completed their entire education at Marshall.
- Twenty-nine percent reported no educational debt (down from 34% in 2013-2014), while 41% reported debt greater than \$20,000.
- Most respondents stated that their educational objective was to begin their first career.
- Fifty-five percent of respondents said they had participated in an internship or practicum (compared to 57% in 2013-2014), with 60% (compared to 59% in 2013 2014) believing this experience had helped them find employment.
- Fifty-eight percent (as compared to 57% in 2013 2014) of respondents indicated that they intend to pursue graduate studies, while only 4% indicated that they intend to work for a Volunteer Organization such as the Peace Corps or AmeriCorps.
- Most students reported that they intend to remain in WV to complete graduate studies and most chose Marshall University for this purpose.

- Students reported positive feelings about all aspects of their MU education. On a scale of 1 5, with 1 being "strongly agree," 2 being "agree," 3 being "neither agree nor disagree," 4 being "disagree" and 5 being "strongly disagree," means exceeded 2 for only three (as compared to four in 2013-2014) out of fourteen items. All of these items were the same as those identified in 2013 2014, while the item in red did not exceed 2.0 this year.
 - I developed the ability to use mathematics to explore real world problems.
 (2.05)
 - Writing intensive courses helped me to improve my writing skills. (2.07)
 - I broadened my appreciation for the arts. (2.14)
 - I developed multicultural and global perspectives. (1.94)

- On a scale of 1 5, with 1 being "very satisfied," 2 being "satisfied," 3 being "neutral," 4 being "dissatisfied," and 5 being "very dissatisfied," students reported greater satisfaction with
 - the quality of teaching (1.86) than with
 - the quality of advising (2.28)
 - academic support services (2.20)
 - classroom and lab facilities (2.21)
- Sixty-six percent of respondents plan to be employed in their major field, 11% not in their major field, and 23% were unsure at the time of the survey.
- Fifty-seven percent (down from 58% in 2013 2014) plan to work in WV.
- Forty percent (of the 397 students who answered the question) reported having accepted a job (up from 37% in 2013 – 2014). Of those, 67% will earn more than \$30,000 annually (up from 63% in 2013 – 2014).
- Only 18% of respondents reported using Career Services (down from 22% in 2013-2014), with JobTrax and Resume Assistance used most frequently.

Appendix XXIX 2015 Freshman Survey Results as They Relate to FYS

Background

In December 2015 the Office of Assessment sent a short survey to 2,060 freshmen, 928 of whom were enrolled in First Year Seminar (FYS) during the fall semester of 2015. Surveys were at least partially completed by 572 freshmen, 313 enrolled in FYS (34%) and 259 not enrolled in FYS (23%) during the fall semester. The survey consisted of 27 items, 25 of which aligned to one or more of Marshall's Degree Profile outcomes. Twelve of the items were taken (or adapted) from the *National Survey of Student Engagement* (which our freshman and seniors will be asked to complete in spring 2016) and the rest were developed by Marshall faculty and staff.

Analysis of results included the following comparisons:

- 1. The 313 freshmen enrolled in FYS and the 259 freshmen not enrolled in FYS during the fall semester.
- 2. The 313 freshmen enrolled in FYS and 256 freshmen not enrolled in FYS during the fall semester (this analysis excluded three freshmen who completed FYS during summer 2015).

Results and Analysis

Results for the 313 freshmen enrolled in FYS and the 259 freshmen not enrolled in FYS during the fall semester.

- Independent samples t-tests showed that freshmen enrolled in FYS during the fall semester of 2015 had
 significantly higher means than those not enrolled in FYS on six of the 27 items. Two of these items aligned to
 Marshall's Intercultural Thinking outcome, two to Communication Fluency, one to Information Literacy, and one to
 Integrative Thinking and Ethical and Civic Thinking. Further analysis using Chi-Squares resulted in significance for
 the two items above that aligned to Communication Fluency and three additional items; one aligning to Integrative
 Thinking, one to Creative Thinking and Integrative Thinking, and one to Information Literacy and Inquiry-Based
 Thinking.
- We note that FYS means were higher than non-FYS means for all items except two, and for these items the FYS means were 2.93/3.14 and the non-FYS means were 2.96/3.14.

Results for the 313 freshmen enrolled in FYS and 256 freshmen not enrolled in FYS during the fall semester (this analysis excluded three freshmen who completed FYS during summer 2015).

Independent samples t-tests showed almost identical results to the first analysis. The only difference was that the
mean difference between one item that aligned to *Intercultural Thinking* barely missed reaching significance.
 Results for Chi-Square analyses were the the same as those reported above.

Discussion

Although results must be interpreted with caution, results showed that, during the semester students were enrolled in FYS, they reported that they had often or very often engaged in activities that aligned to the following Marshall outcomes:

Creative Thinking: Chi-Square difference for one item

Ethical and Civic Thinking: Mean difference for one item

Intercultural Thinking: Mean differences for two items (when compared to all freshmen not taking FYS in fall 2015) and for one item (when three students who had taken FYS during summer 2015 were excluded)

Integrative Thinking: Mean difference for one item, Chi-Square differences for two items

Information Literacy: Mean difference for one item, Chi-Square difference for one item

Inquiry-Based Thinking: Chi-Square difference for one item

Communication Fluency: Mean differences and Chi-Squares for two items

We note that these differences were seen with four of the five outcomes of FYS. The fact that significant differences were seen with *Communication Fluency* is testament to the emphasis on active learning in the course (made class presentations) and the use of multiple written assignments as a method of learning (completed writing assignments).

Appendix XXX Assessment Day Focus Group Reports

Assessment Day Focus Group Report - Assessment Day 2011

Topic

What Makes a Good Classroom Learning Experience?

Format

Four Focus Groups (2 consisting of freshmen and sophomores and 2 consisting of juniors and seniors) were held. Total number of participants was 67 and there were representatives from the following academic colleges at Marshall: COLA, COFA, COS, COHP, COEHS, CITE, LCOB, SOJMC, and RBA program.

Major Themes that Emerged from the Groups

Question: "What Makes a Good Classroom Learning Experience?"

1. Active Learning and Critical Thinking

- Students use course content to engage in "hands-on" work, both inside and outside the classroom.
- Students apply knowledge through laboratory and other field experiences.
- Students learn through completing projects where they must find answers by doing research.
- · Students and Professors engage in open discussions.
- · Students and Professors interact with one another during the classroom experience.
- Students and Professors think through ambiguous problems.
- Students complete projects that have general guidelines, but allow enough latitude for them to develop new ideas and solutions.

2. Instructor Characteristics

- Professors are passionate and enthusiastic about the subject.
- Professors respect students.
- Professors communicate effectively with students talk to them, not at them.
- Professors are organized.
- Professors are accessible to students have "open door" policies.
- · Professors relate course material to "real-life" situations.
- Professors help students discover their learning styles <u>and</u> use a variety of teaching methods, taking into consideration the variety of learning styles represented by students in their classes.
- Professors have high expectations for students and communicate those expectations to students.

3. Effective Use of Assessment

- · Professors make students aware of each course's intended learning outcomes.
- Professors provide frequent feedback to students regarding their progress in each course.
- Professors allow students to learn from mistakes by providing corrective feedback.
- Professors seek feedback from students to help improve teaching methods.

· Professors encourage students to keep up with material by giving frequent quizzes.

Additional Issues

Students did not feel that they learn effectively from what they considered to be an inappropriate use of PowerPoints. They were particularly critical of professors who put all their notes on PowerPoint and then simply stand in front of the class and read the information. They strongly suggested that PowerPoints be used for Organizational purposes only. They stressed that they learn much more effectively when being required to take notes and to use information to complete projects and other classroom work.

Students stressed that multiple choice tests <u>do not</u> assess critical thinking and objected to their overuse in some general education classes.

Students opined that most of the instructional methods that encourage deeper student learning are best accomplished when class sizes are small.

Student requested that professors be asked to post grades in Blackboard as semester progresses, so that they will be able to gauge their progress.

Issues Specific to Freshmen

Freshmen discussed the First Year Seminar (FYS) courses and had the following suggestions:

- 1. Organize FYS by major.
- 2. Standardize FYS to be sure critical thinking is at its core.
- 3. Relate FYS to life.
- 4. All students should take FYS first semester.
- 5. All FYS courses should teach students how to do library research.

Concluding Thoughts

If I had to say there was a dominant theme, it was that we all learn best by <u>doing</u>, i.e. using new information in some sort of meaningful way. Another strong theme was that we learn by <u>discovering</u> information and answers to questions for ourselves.

Assessment Day Focus Group Report - Assessment Day 2013 (April 3)

Topic

What Makes a Good Classroom Learning Experience?

Format

Two Focus Groups (one consisting of freshmen, sophomores, juniors, and seniors and the other consisting of freshmen, sophomores, and juniors) were held. The total number of participants was 18 (4 freshmen, 4 sophomores, 5 juniors, and 5 seniors; 11 females and 7 males; 1 Board of Regents, 4 College of Business, 4 College of Education, 2 College of Health Professions, 3 College of Liberal Arts, 3 College of Science, and 1 College of Information Technology and Engineering).

Major Themes that Emerged from the Groups

Question: "What Makes a Good Classroom Learning Experience?"

1. Active Learning

- Discussion/questions/small class size
- Application, "hands-on" learning
- Connection to the "real-world," e.g. job students will have in future
- Interaction with peers and professors
- Opportunities to practice, including clinical experiences and internships
- Project based/team based learning
- Group projects can learn from each other, but it can be stressful when one member
 does not pull his/her weight on the other hand one learns how to deal with different
 types of people and is better off in the long run if he/she participates fully in the group
 project.

2. Connections

- Major concepts (program's learning outcomes?) should be reinforced in many classes
- Real-life applications

3. Assessment

- In addition to opportunities to practice, students must receive formative assessment.
- Students need to know what is expected of them, i.e. outcomes and rubrics should be provided.

4. Professors

- Should be prepared to teach
- Should be passionate about their subjects
- Should have practical experience with their field
- Should be responsive to, and collaborative with, students
- Should have good classroom management skills
- Should have and enforce attendance policies
- Should not just read from PowerPoints

Issues Specific to First Year Seminar (FYS)

- Recommended more uniform structure
- Realized its value a year after taking the course
- Said that Metacognitive Reflection is an important part of this class helped students to "learn how to learn"

Thoughts

Data were last collected on this topic during Assessment Day in 2011. At that time 67 students participated in the Focus Groups and all academic colleges were represented. The number this year was only 18 and the College of Fine Arts and the School of Journalism and Mass Communications were not represented. However, major themes (Active Learning, Caring and Engaged Professors, and Effective Use of Formative Assessment) remained the same. However, one theme that emerged this year, the need to connect important information across multiple courses within a major, did not emerge in 2011. This finding points to the importance of program and university outcomes.