

ADMINISTRATIVE PROGRAM REVIEW AND EVALUATION 2009-2010

OVERVIEW

Units Reviewed

- Catamount Academic Tutoring Center/Office of Professional Examinations
- Mathematics Tutoring Center

External Reviewer

- Sara Weertz, Director of Supplemental Instruction at Angelo State University (Chair)

Internal Reviewers: Catamount Academic Tutoring Center

- Laura Cruz, Associate Director of Coulter Faculty Center
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Internal Reviewers: Mathematics Tutoring Center

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ABSTRACT

An evaluation is a judgment on the merit or the worth of something. In an effort to develop assurance that an educational program has impact and value, the evaluator must look at a host of variables associated with the program (Gagne, et al, 1992). Just as there are different models or designs to use in this process, there are also different evaluations, most notably formative, summative, and confirmative.

Conducted during the development stage, the formative evaluation creates feedback on the program design, thus allowing planners to review, analyze, and revise accordingly. Summative evaluation, conducted immediately after a program has been implemented, analyzes expected outcomes in an effort to "sum up" program results. Finally, confirmative evaluation evaluates all the people, inputs, outcomes, and processes of an established program. Confirmative evaluations, conducted after a program has been in place for some time, "confirm" the value of a program and assist staff in the continued growth and improvement of the program (Dessinger and Moseley, 2004).

Inherently there are three arguments for a program evaluation — those being validation of methods and procedures, accountability, and decision-making. The twofold aim of this evaluation looks at accountability and validation to a) provide stakeholders with empirical evidence regarding the effectiveness and efficiency of the Catamount Academic Tutoring Center/Office of Professional Examinations and the Mathematics Tutoring Center, thus effecting assurance of their impact and value, and b) to illuminate areas of improvement and offer recommendations for subsequent program growth. In doing so, this confirmative evaluation seeks to answer three central questions:

- 1) Are these administrative units in accordance with Western Carolina University's mission and Quality Enhancement Plan (QEP)?
- 2) Are these administrative units reaching the goal and objectives of learning assistance in general?
- 3) How can these units improve and grow?

Over the course of three days, the review team met with the directors of both units, faculty from across campus, leaders of other academic support units, students (tutors and tutees), administrative staff, and representatives from the Provost's office and Institutional Planning & Effectiveness. Reviewers also received a tour of both facilities (see Appendix for complete schedule). Prior to the site visit, the team reviewed a considerable amount of program documentation, statistical analysis, and benchmark data

which highlights the units' impact on academic standing and indicates their academic support can and indeed does improve students' grades and University retention efforts. Of significance is the statistically positive correlation between the number of tutoring sessions attended and final course grades. Equally remarkable is the varying type and amount of academic assistance/service provided to students across campus. (See the Administrative Program Review 2009-2010 CD for a complete listing of associated program data which is referred to often in this report.)

Considering the University's commitment to evaluation and program assessment as well as its pledge to improve academic programs and services, this confirmative evaluation is noteworthy, because it judges whether the Catamount Academic Tutoring Center and the Mathematics Tutoring Center are meeting their goals and objectives. Findings gleaned from this evaluation provide not only the value and impact of these vital programs, but also provide recommendations and suggestions for continued program enhancement.

I. STRENGTHS OF EXISTING PROGRAMS

It is a great pleasure to serve on a review team for thriving administrative programs. The consensus of the review team is that both the Catamount Academic Tutoring Center and the Mathematics Tutoring Center are working and working well. The review team identified four distinct areas in which both units exhibit specific strengths: leadership, vision, service, and alignment with the University mission and the Quality Enhancement Plan.

A. Leadership

Both the Catamount Academic Tutoring Center/Office of Professional Examinations (herein referred to as the CAT Center) and the Mathematics Tutoring Center (herein referred to as MTC) benefit from exceptional leadership on the part of their respective directors, Chesney Reich and Nory Prochaska. These directors bring strong qualifications and considerable teaching experience to their respective roles, in addition to specialized training and work with learning assistance programs in higher education. The review team saw consistent evidence of their hard work, dedication, professionalism, and ability to foster effective collaboration across various levels. From the students to the faculty to unit directors, discussion about the CAT Center and MTC directors evoked unsolicited, specific, and personal praise for their work both in their centers and as responsible University citizens.

B. Vision

The CAT Center and MTC directors have shown a willingness to adjust the services and how they are provided to meet changing campus needs. Under the leadership of Reich and Prochaska, the centers have moved from providing basic tutoring services to becoming more holistic centers that work to enhance student academic success beyond the confines of their walls. Under their directorships, the tutoring centers have expanded to include not only those students struggling and in danger of failure or withdrawal but students at all levels of academic achievement.

An example of said vision has been Reich's and Prochaska's exploration of Supplemental Instruction (SI), which has the potential to not only increase the number of successful final grades in targeted courses but also to improve the persistence and retention rates on WCU's campus. Supplemental Instruction is an internationally recognized learning enhancement program. Sometimes referred to as "super group tutoring," SI involves the identification of a peer student (SI leader) who has demonstrated competency in a specific course and has been referred by the department. The SI leader attends class, modeling effective classroom behavior; and then following the lecture, the SI leader holds regularly scheduled study groups (SI sessions) offering ample opportunities for the students to get engaged in the learning process and to get actively involved in the coursework outside of class. A tenant of the SI model is the SI session's combination of course content and study skills specific to the course. More than 1800 universities in the United States and 27 countries have established some form of Supplemental Instruction. For the past 40 years, these programs have pooled their SI data with the University of Missouri, Kansas City (UMKC) which documents annual program statistics indicating that students who

attend SI sessions on a regular basis (once a week) earn between a half letter and a full letter grade better than students who choose not to attend SI.

In *Diploma to Nowhere* (Strong American Schools, 2008), the authors maintain well over a third of students entering college are underprepared and in need of developmental education in reading, writing, math, or a combination of the three. And this includes students who graduated from high school at the top of their class. "Some of the nation's most selective universities...now test all incoming students to determine who needs extra academic help" (3). Considering the fact that Western does not have a Developmental Education program, the review team believes SI can be a powerful tool to assist struggling students as well as increase overall student learning. The CAT Center's successful SI pilot with two sections of PSY 150: General Psychology (summer 2009) confirms SI's potential for WCU students.

While Reich and Prochaska pursued and successfully completed UMKC's train-the-trainer certification, the SI model in its purest sense may be less applicable to the MTC for two reasons:

- 1) Math tutors are typically graduate students with existing teaching and tutoring experience so mandatory two-day pre-term training may not be necessary and may even be redundant.
- 2) SI generally supports large lectures (50 to 100 students) providing smaller, informal student sessions which, in theory, reduce the intimidation factor and feelings of anonymity often associated with classes of this enrollment size.

Even though WCU math classes are typically smaller, the high number of struggling students remain. It is for that reason Dr. Prochaska is considering a modified version of the SI model where SI leaders attend abbreviated training and student visits to the math lab are part and parcel of the class. The review team commends Dr. Prochaska for her visions and insight into this area and wishes to encourage her to pursue these ideas.

Both tutoring centers have shown vision to expand their services beyond the confines of their office and into the classroom offering learning skills workshops. The review team applauds Dr. Prochaska's development of a workshop entitled, *How To Survive a College Math Class*, which is an exploration of the various learning and study strategies specific to mathematics and was designed based on her observations of the struggles incoming students face with their first college-level math class. *How to Survive a College Math Class* is offered approximately six times (usually around week five or six) in the afternoons and evenings, outside of class. Dr. Prochaska will provide this as an in-class workshop, although few instructors have taken her up on the offer, because of the loss of lecture time. An alternative to consider might be extra credit for students attending this much needed workshop as a co-curricular activity. During our meetings with faculty, many voiced positive consideration for this sort of relationship or partnership with the tutoring centers.

The review team further commends Ms. Reich for her innovative use of study skills consultants, student workers, who facilitate workshops such as Learning Styles, Note-taking, Test-taking Tips, etc. Over the past three years the center, with assistance from the study skills consultants, conducted an average of 62 workshops with well over 1000 students. More than half of these workshops were presented in-class at the request of instructors whose students demonstrated a need for skill development. On average, 12 of these workshops are devoted to Time Management.

Ms. Reich's enterprising actions have led to the successful acquisition of International Tutor Program Certification through the College of Reading and Learning Association (CRLA). The review team chair has experienced this lengthy and detailed certification process and can honestly say this is no small feat. CRLA has world-wide recognition as a leader in the field of tutor and mentor program standards, setting the pace for tutoring training and in-service. CRLA tutor certification means the CAT Center is registered to provide individual certification to CAT tutors. The review team understands Ms. Reich is certified at Level One and encourages her to pursue Level Two: Advanced Tutor and Level Three: Master Tutor.

Student worker positions such as tutors, SI leaders, and study skills consultants further Western's mission to engage students in meaningful service learning assignments. Considering the limited number of

professional-type student jobs, both on campus and in the surrounding area, student work in the CAT Center and MTC make for a win-win situation.

Lastly, in regards to vision, both directors have consistently pursued internal opportunities to advance the activities of their centers and to increase recognition. A final example is the Scholarship of Teaching and Learning (SoTL) grant award and a WCU Assessment grant award.

To nurture this vision and innovation, the review team recommends more CAT Center and MTC program resources to support the directors' professional development and program enhancement, as well as the potential implementation and development of Supplemental Instruction (SI).

C. Effectiveness of Service

In their current forms, both centers have a broad mission to provide academic support across campus. Every year, the CAT Center provides general tutoring services and workshop support to nearly 2000 students, 150 faculty, and 190 course sections, in addition to supporting 40 to 50 tutors. The MTC annually receives over 2700 visits and employs 6 to 12 tutors. Both centers provide drop-in tutoring, one-on-one tutoring, group tutoring, and learning skills workshops. Though the MTC shows favor with drop-in service, as it seems to work well with WCU math students, and the CAT Center tends to show higher numbers with appointments, both centers would like to maintain a combination of drop-in and appointment, as well as one-on-one tutoring and group sessions. The current operating budget for the MTC (approximately \$11,500 per year) and the CAT Center (about \$16,000 per year) — 90% of which goes directly to student wages — is not nearly enough to provide effective and efficient tutoring services in the manner described. Considering the scope of WCU tutoring in comparison to their meager budgets and the knowledge of operating budgets for tutoring at peer institutions (see MTC Self-Study and CAT Center Self-Study), these services are unable to live up to their full potential. With a larger operating budget and possibly more tutors and staff, these centers could expand their outreach and niche marketing efforts to further their partnerships across curricular and co-curricular lines.

When speaking with the tutors, they seemed comfortable with their pay rate (between \$8.00 and \$8.75 an hour depending on tutor status) especially given the main alternative to campus employment which is work in the fast food industry. While the pay rate seems comparable with researched peer institutions, many learning assistance programs are increasing their tutor hourly pay to \$10.00 an hour plus an additional .25¢ increase with each level of CRLA certification. The higher rate of pay and additional in-service training/professional development opportunities for these students workers not only sends a message to students about how seriously the University takes this work and the service the tutors provide for the institution, it also can help recruit tutors. The review team recommends increasing the budgets of both centers to reflect their expanding role in providing broad-based student support.

D. Alignment with University Mission and Quality Enhancement Plan

As their self-studies confirm, both tutoring units provide support to enhance the quality of student learning outlined by the University's Quality Enhancement Plan (QEP). The CAT Center and MTC directors participated heavily in the administration and development of the QEP (Dr. Prochaska as head of the Educational Briefcase initiative and Ms. Reich as a member of the QEP Assessment Committee); and this experience gives them unique insight into the present QEP operations as well as the ability to visualize where the initiative is heading.

While their support for specific disciplinary content contributes to cognitive skills such as integration of information, effective communication, and solving complex problems, the centers also support broad-based skill sets such as test-taking skills, time management, effective note-taking, understanding learning styles, and other transferrable strategies that support the mission of synthesis and academic success as outlined in the QEP. The centers offer workshops and one-on-one guidance with both course-specific and non course-specific issues. The CAT Center in particular has expanded its role in providing study skills consultants, multi-talented and multi-disciplined students who are trained to work with their peers in a variety of areas. Two wonderful examples of this are the specially tailored program of workshops for

athletes known as CHAMPS Life Skills and the Learning Skills Workshops for Western PEAKS, a first year living-learning residential community program.

The CAT Center and MTC work with future teachers, a key objective of the UNC Tomorrow initiative. MTC graduate assistants typically tutor for two semesters before becoming instructor of record for introductory mathematics courses. The CAT Center designed and implemented a tutor training program for WCU Teaching Fellows who tutor in the public schools. As the CAT Center's Self-Study attests, 79% of Teaching Fellows noted their tutor training contributed to their development as future teachers.

Of particular note is how both tutoring centers develop the skill set and academic success of their student employees. In meeting with tutor, trainer, and lab assistant representatives, the review team found many of these student workers recognized, articulated, and greatly appreciated how their tutor work prepared them for academic success and their future careers. Both centers provide structured training and professional development for student workers (in the case of the CAT Center, formal certification) and both centers provide opportunities for reflection and creating career-building products and outcomes. The review team's tutor interviews and the tutor surveys provided by the CAT Center and MTC assert how meaningful tutor participation is for these students.

Considering the WCU Mission Statement which vows to *create learning opportunities that incorporate teaching, research, and service through residential, distance education and international experiences*, and that student employment opportunities in the region are relatively scarce, the team believes the ability to provide career-enhancing employment for WCU students is one of the centers' greatest strengths.

II. RECOMMENDATIONS

The review team would like to make the following recommendations regarding alignment and integration of tutoring services at Western Carolina University.

A. Alignment

The primary purpose of the Mathematics Tutoring Center is to *provide academic assistance to students enrolled in mathematics courses or courses with mathematical content* (MTC Self-Study). The primary purpose of the Catamount Academic Tutoring Center is *to provide students with the resources they need to achieve academic success* (CAT Center Self-Study). Allied support directors cited one of the strengths of the Academic Success Centers is their ability and willingness to reach all students, as they should because the face of academic assistance in higher education is changing. Regardless of whether students are struggling with academic rigor, physical or learning disabilities, the balance of work and school, high achievement goals, a social life, or other challenges and commitments, the ASCs are able to meet their needs. While the review team feels there is the distinct possibility that at one point or another in every student's college career they will need some type of academic support and assistance, we caution viewing the CAT Center and MTC as a panacea to Western's retention concerns.

The review team further does not want to focus on alignment as a weakness, but the consensus is that both centers carry the weight of these obligations beyond their ability to meet them. If every student at WCU accessed these tutoring services, the centers would be overwhelmed—never mind the fact they are already strained with limited budgets. And yet their mission induces them to try to achieve this goal. While the MTC benefits from its informal affiliation with, and close proximity to, the Department of Mathematics and Computer Science, their mission suggests that they should be working towards greater participation from other departments with courses requiring mathematical skills. Likewise, the CAT Center provides tutoring services for most 100- and 200- level courses, with some courses utilizing the CAT tutors extensively and others hardly at all.

The team senses both centers would benefit from focusing their mission on objectives that can be met with existing (or expanded) resources and that are closely aligned with the goals, both current and future, of individual students, faculty, departments, allied staff, and the University as a whole. By achieving this alignment, the centers should be able to focus their time and resources on those areas in which they can be most successful and thus rid themselves of obligations that are not contributing to either the

enhancement of student learning or the engagement of learning opportunities. The review team recommends alignment through the implementation of four strategic directions as outlined below.

1. Advisory Board

The review team recommends the creation of an advisory board to include representatives from the faculty, students, and other support units—similar to what we experienced during our on-site visits. If the centers are to enhance the alignment between their services and University demand, it will be necessary to gain consistent input, support, communication, and buy-in from those with whom the CAT Center and MTC can partner with to enhance and improve their services. This can be effectively achieved through regular consultation with an appointed advisory board.

It was clear from interviewing faculty that WCU places great value on departmental autonomy and different departments and programs want and need different types and levels of support from the ASCs. Faculty support for SI, for example, was strong in some areas, but resistant in others, which is usually the case with an unknown. While SI typically is linked to courses with traditionally high failure and withdrawal rates, faculty may question why an SI leader is placed in their class. The review team, therefore, highly recommends offering academic assistance such as tutoring and SI to departments that want and invite this support. Wide-spread reporting on the success of tutoring and SI will provoke questions and possibly subsequent invitations from previously reluctant faculty. The same is true for faculty and departments who wish to maintain their own tutors. Over time, the benefits of standardized tutor training, centralized supervision and program management, not to mention formal tutor certification and professional development will sell this program.

The review team recommends Reich and Prochaska work in conjunction with their advisory board to complete the final three strategic directions regarding needs assessment, mission statement, and marketing.

2. Needs Assessment

The review team recommends both centers develop a culture of systematic needs assessment, which highlights knowledge and attitude while focusing on past and present work. Short term, this would mean a comprehensive performance analysis; long term would entail the creation of a continual calendar of performance analysis confirmation and update (strategic planning) as these units continue to grow and develop along with the University. The purpose of the performance analysis would be to identify areas of University academics where academic assistance can be provided most efficiently, now and in the future. Following are some resources for conducting a systematic needs assessment:

- *CAS Professional Standards for Higher Education* (Dean, 2009) from the Council for the Advancement of Standards in Higher Education. CAS is often referred to as the Blue Book of higher education of professional standards because they guide both practice and preparation. The latest edition contains standards for 40 areas including the role of Learning Assistance Programs. CAS also offers *Frameworks for Assessing Learning and Development Outcomes* (Strayhorn, 2006). On the surface, CAS may seem too detailed for the CAT Center and MTC performance analysis, as their initial self-studies covered many of its learning and development domains. It is the chair's advice is to view CAS as a long-term project which will tie-in with SACS accreditation criteria (the original "input" model based on the number of programs being jettisoned in favor of an "output" model) which no longer is as concerned about the number of programs created, but instead that students are learning what we say they are learning in the programs we now offer.
- Patricia Fullmer wrote an article for the *Journal of College Reading and Learning*, entitled "The Assessment of a Tutoring Program to Meet CAS Standards Using a SWOT Analysis and Action Plan" (2009). This article takes the reader through the process summarizing SWOT (Strengths, Weaknesses, Opportunities, and Threats) and ultimately aids in the outline of an action plan that may jumpstart the performance analysis.

- The Learning Support Centers in Higher Education website (Sheets, 2010). In particular is the LSCHE best practices page which details nine areas to consider when conducting a comprehensive evaluation or performance analysis.
- CRLA published a monograph entitled, *Starting a Learning Assistance Center* (Christ, 2000). Several chapters may be of help in this process, as they deal with evaluating programs and assessing the needs of services as well as developing learning assistance standards.
- Read Allison Rossett, whom many evaluation experts consider to be *the* leader in needs assessment. Rossett's latest book, *First Things Fast: A Handbook for Performance Analysis* (2009), will help to define operational goals and identify processes and people associated with operational goals, as well as finding the best approach to realizing those goals.

3. Mission Statement

As part of the environmental scan provided by the performance analysis (above), the review team recommends both centers recreate or reevaluate their existing mission statements to focus and align their core objectives. The review team would like to suggest this be done in consultation with the advisory board, perhaps in the form of a Retreat for CAT Center and MTC staff, allied support staff/ASC partners, and advisory board members.

The review team believes the CAT Center and MTC self studies will be an instrumental part of the mission statement evaluation process. The center directors and advisory board may also wish to peruse the website for Learning Support Centers in Higher Education (Sheets, 2010) specifically the LSCHE tab entitled, About Learning Centers, which lists numerous links to learning support surveys, learning commons, key support terms, and mission statements from various institutions with academic assistance programs similar to Western's mission and vision.

4. Provision of Services

Increased exposure, access, and use of tutoring services at Western are contingent on a number of cultural and social factors. At a few points during the visit, the review team discussed their views regarding the stigma associated with tutoring, the need for students at all levels of achievement to recognize when and how tutoring or other academic support might enhance their learning, and the importance of faculty support in creating positive perceptions of these services. The review team acknowledges the CAT Center and MCT do indeed understand the negative perception their services produce and ask that they face this issue within the performance analysis as a way to determine the root cause. While both units have performed studies aimed at identifying and overcoming obstacles to utilization of support services, these have focused largely on student views and not on those of faculty. Interviews with selected faculty and staff solicited the following suggestions:

- Provide a standardized syllabus statement regarding the CAT Center and MTC to be included in the University syllabus template.
- Extend drop-in tutoring hours at the CAT Center.
- Create embedded subject tutors located in more remote parts of campus.
- Provide on-line tutoring services using WCU tutors.
- Design small group study areas near the CAT Center and MTC.
- Offer SI support.
- Explore avenues of extra class credit for tutoring out of class.
- Develop a Faculty Guide regarding tutoring support.

It is the consensus of the review team that the utility of these suggestions and others perhaps best be considered through the lens of the performance analysis.

Despite the opening line in this section (Provision of Services), none of the recommendations listed under the Alignment heading rest on the assumption that the success of these centers depends on raising their numbers. Both qualitatively and quantitatively, the CAT Center and MTC currently provide an appropriate level of support to WCU's students. Clearly, the mainstay strength of these centers is their effective service to the students who are using them. The review team's recommendations are designed to focus the provision of those services into those areas where they can be most efficient and effective, rather than simply increasing numbers per se.

Lastly in regards to alignment, the review team recommends the Office of Professional Examinations (OPE) which is currently part of the CAT Center should be reviewed through a similar lens. Other than what was described in the CAT Center's Self-Study and a brief discussion during the on-site visit about financial aspects of online tutoring (via SMARTTHINKING.COM and the office of Continuing and Professional Education), the team does not have enough information about this office and did not receive significant feedback from any of the focus groups on their services. With a surface glance, the OPE seem to be an awkward fit for the developing mission of the CAT Center and could perhaps be constructively moved to a new home under different auspices, or at least is an issue that should be considered in the creation of new administrative priorities.

B. Integration

The review team's second set of recommendations fall under a conceptual umbrella which we are deeming "integration" and consider a more long-term goal predicated on the kind of analysis and study suggested by the needs assessment above. The term itself refers to integrating the activities and services of the CAT Center and MTC into the academic culture and institutional goals of the University. While this kind of integration is certainly a strength of the existing centers, the review team believes that closer and more explicit integration would only benefit both centers in the long run.

Both centers began as administrative initiatives (the MTC created as part of a 1981 CAUSE grant within the then Department of Mathematics and Physics and the CAT Center formed alongside the Student Technology Assistance Center in 2000 under the division of Enrollment Management). Numerous moves, however, both physical and organizational, over time have disadvantaged the structure and campus presence of these units. The review team recommends a new conceptualization of the centers' administration that provides a continual and enduring framework for integrating the centers into the University's academic culture.

Steve Erhmann, a founding member of the Teaching, Learning, and Technology Group, says visible and tangible program outcomes such as the ones we are recommending take nearly a decade to be fully realized. The concern over such a lengthy time period is that "Higher education has always suffered from Attention Deficit Disorder. Many programs are distracted by new needs long before the old needs are met" (2010). A continual and enduring framework, therefore, will entail more attention and resources devoted to program administration on the part of directors and support staff, as well as the possible creation or re-classification of positions to take on some of the functions currently served by Reich and Prochaska. The review team recommends integration within three functional areas detailed below.

1. Retention and Graduation Rates

Increasing retention and graduation rates is a primary focus of the UNC system and WCU in particular. The review team feels the CAT Center and MTC have the most to offer to meet this goal in two ways: 1) the provision of transferrable study skills support and 2) the employment of tutors. Additionally, should the CAT Center and MTC choose to expand their support with Supplemental Instruction, a learning enhancement program with proven success increasing graduation and retention rates at other comparably institutions, the review team believes this enhancement can be actualized at Western.

While the activities and services of both centers clearly contribute to increases in retention and graduation rates, the direct impact of their support on these rates has not been fully acknowledged. This assessment issue is compounded by the fact that both centers were instituted to assist students in danger of receiving DWF grades and, rightly so, have expanded to include students from across academic achievement

levels. While this initiative and progression is not uncommon in institutions of higher education, the residing residual is. Similar to many premier universities, Western conceived the umbrella Academic Success Centers to offer all students *customized support* within an academic environment that helps them take responsibility for their learning. And yet, it seems, the overriding perspective of the CAT Center and MTC is their remedial function.

Both centers have conducted studies showing grade improvements for students who have received services (see appendices from self-studies), but do not have quantifiable evidence to determine whether improving performance leads directly to increased retention and timely progress towards graduation. Standard analysis of the tutoring data reveals significant differences between tutees and non-tutees, such that the more tutoring visits per student, the higher the grade. Detractors easily dismiss this impressive data and opine against the simple correlation when in fact the data indeed depicts the student learning outcomes necessary for accreditation. The review team suggests the CAT Center and MTC work closely with Office of the Provost and Institutional Planning & Effectiveness to develop and test this assessment link using the following measures:

- Work with TutorTrac software management to develop reporting procedures that "tap" into the student information system (BANNER) to design a tracking system that 1) tracks student visits to all tutorial units at Western, and 2) provides the empirical evidence needed to illustrate the correlation between the number of tutorials attended and improved grades, particularly of those students considered less proficient.

Collect data from students enrolled in classes specifically supported through the CAT Center and MTC: ethnicity, classification, GPA scores for sophomore or higher and SAT/ACT scores for entering freshmen, etc. TutorTrac will, of course, record and track the number of tutoring visits. Since the centers are already reporting to instructors on a weekly basis, they may consider tracking class exam/test scores while monitoring the students' tutoring attendance in between. This combined data offers a bird's eye view of student cohorts and will not only allow each center to create student profiles, but also enable them to make predictions based on student classification, GPA, and level of motivation. For example, based on a freshman's low ACT score (which test science proficiency), how successful will this student fare in a traditionally difficult biology class where many students struggle, if he/she does not utilize academic assistance?

- Develop pre/post instruments and observational protocols for all students with access to the CAT Center and MTC, asking questions to measure and rate the students' level of motivation and self-selection ability.

2. Quality Enhancement Plan (QEP)

Both the CAT Center and MTC contribute to the QEP in several significant ways (see Alignment with University Mission and Quality Enhancement Plan, I-D) and both directors are active in the implementation of the QEP on campus. The review team sees opportunities for these centers to enhance this role in the future. The QEP is based on models of intentional and integrative learning, both of which are enhanced through the provision of academic support to students. The Review Team suggests the centers take the following measures:

- Within the performance analysis, include QEP benchmarks and language developed by the QEP assessment committee to demonstrate the link between tutoring services, center objectives, and desired University outcomes.
- Incorporate the centers' service learning aspect as an active role in the implementation of Educational Briefcase, a key component of the integrative learn piece of the QEP.

3. Marketing

The stigma surrounding tutoring (discussed in Provision of Services, II-A4) has been successfully addressed at other institutions through intentional branding and marketing campaigns on behalf of Academic Success Centers. Marketing for the centers has been constrained by budget and time and the team suggests increasing both, but not before careful study and development of a marketing plan that may include the integration of activities and services (outlined in Recommendations, II-A2 and II-A3). A successful marketing plan rests on a clear and shared understanding of services and provides promotional strategies which will, in turn, lend strength and credibility to the systematic assessment process. The review team, therefore, suggests that in order to create a marketing plan, the CAT Center and MTC directors might benefit from collaborating with faculty and students in the Business College or from hiring a consultant.

Across the board, internal review team members were pleasantly surprised to learn about the scope of the centers' activities and services in addition to some of its most successful curricular/co-curricular programs and partnerships with Mathematics and Computer Science, Modern Foreign Languages, Athletic Affairs, Teaching Fellows, Residential Living, and In-Class Study Skills Workshops — all of which are not well-known across campus. The review team as a whole suggests that perception issues can be addressed through stronger campus communication. As a part of the marketing plan, the team encourages the CAT Center and MTC to consider a regularized system of reporting on their successes and aggregate data to the campus as whole.

III. BENEFITS TO WESTERN CAROLINA UNIVERSITY

The review team believes its recommendations will enhance the current success of the Catamount Academic Tutoring Center and Mathematics Tutoring Center, and that success will provide specific and demonstrable benefits to the University as a whole. While the review team is recommending increased resources to these centers, this suggested increase will only serve to improve the returns on that increased investment. A quick calculation regarding the return on investment for one freshman who persists at Western can be multiplied by three years or more. Add to that, the cost effectiveness of study skills consultants, group tutors and SI leaders who are paid on an hourly basis yet log multiple student contacts per hour. The investment is quite economically sound (Congos, 2001).

The rate of return can also be taken literally, as the review team believes the centers are able to provide the necessary documentation proving their services directly contribute to increased graduation and retention rates across campus. Institutional studies of academic assistance (Lian, Richardson, and Xu) indicate not only an increase in persistence and retention rates but also a reduction in the rates of attrition. These studies indicate students are more likely to remain enrolled and succeed in difficult classes when they know they can go to someone on campus for help. The future enhancement of the CAT Center and MTC services will only improve upon that contribution.

In conclusion, both centers are poised to play integral roles in the successful implementation of the QEP and UNC Tomorrow initiatives. The tangible benefits of these thriving centers are myriad; so too are the intangible benefits. As one tutor said, his work assisting students not only kept him at WCU, it made him feel more connected to the campus and proud to be a student (and soon-to-be alumna). These benefits are not easily quantifiable but will prove to be invaluable for the well-being of the institution, long-lasting public relations, and recruiting and retention efforts for Western Carolina University.

Respectfully submitted,

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