

**Florida Atlantic University
College of Education
Department of Teaching and Learning
Program Review
January 27-29, 2016**

Review Team:

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OVERVIEW

The team of Dr. Jerry Becker, Dr. Bradford Brown, Dr. Patricia Edwards, and Dr. Evonne Rezler reviewed FAU's Department of Teaching and Learning, College of Education on January 27-29, 2016. Dr. Patricia Heydet-Kirsch, Assistant Dean, Accreditation and Assessment, College of Education provided the reviewers with self-studies for each program housed in the Department. Ms. Cheryl Marcello provided a detailed itinerary and exemplary logistical support. Additionally the review team met with:

- Many members of the Department faculty in three separate meetings: 1) tenure track and non-tenure track, 2) only assistant professors and 3) only adjuncts
- Russell Ivy, Associate Provost
- Camille Coley, Senior Associate Vice President for Research
- Donna Chamely-Wiik, Director Office of Undergraduate Research and Inquiry (OURI)
- Debra Floyd, Dean of the Graduate College
- Susan Fulks, Assistant Dean of the Graduate College
- Ed Pratt, Dean of Undergraduate Studies
- Valerie Bristor, Dean of the College of Education
- Don Torok, Associate Dean of the College of Education
- Deborah Shepard, Associate Dean of the College of Education
- Joel Herbst, Assistant Dean of the College of Education
- Barbara Ridener, Associate Professor and Chair of the Department of Teaching and Learning
- Andrew Brewer, Exceed Project
- Gracie Diaz, Exceed Project
- Graduate and undergraduate students

The Department of Teaching and Learning in the College of Education houses eight degree programs, at the undergraduate and graduate levels. These are: 1) Elementary Education with ESOL Endorsement – undergraduate, 2) Elementary Education with ESOL Endorsement plus certification – graduate (Master’s), 3) Elementary Education – graduate (Master’s), 4) Environmental Education (Master’s), 5) Master’s (M.Ed.) Degree in Reading Education, 6) Bachelor’s Degree in Secondary Content Areas: English, Mathematics, Science (Biology, Chemistry, Physics), Social Science – undergraduate, 7) Curriculum and Instruction plus Certification – graduate (Master’s), and 8) Social Foundations: Instructional Technology and Educational Psychology – graduate (Master’s). The review team was provided with six Academic Program Review (APR) self-study documents for these programs. The APR self-studies are well written, comprehensive, and included a thoughtful and honest assessment of strengths and weaknesses of each program and the Department. Also, during the site visit, the review team was impressed with: 1) the level of preparations by the Department for this review, 2) the pedigree and high caliber of the faculty team in the Department, and 3) the quality and dedication of the Department’s and College’s administrative personnel and support staff.

During the APR site visit, the review team was asked to deliver recommendations for identified areas of concern and potential opportunity in the Department. These areas of concern and opportunity were identified through key questions in the five APR self-studies, and were articulated by administrators, faculty, and students during the APR site visit. This document provides a collective review of the six APR self-studies; individual programs will be addressed as needed.

General Comments and Observations

This Academic Program Review (APR) of the Department of Teaching and Learning (DTL) comes at a time when FAU is moving in new and important directions as defined by FAU President John Kelly’s *Strategic Plan for the Race to Excellence 2015-2025*. The Strategic Plan emphasizes and prioritizes STEM programs and research at FAU by reorganizing the university infrastructure and operations into four pillars and eight platforms. The four pillars identify the priority institutional programs focused on creating knowledge that benefits society. These are: 1) Neuroscience, 2) Healthy Aging, 3) Ocean Science and Engineering/Environmental Sciences, and 4) Sensing and Smart Systems. The platforms represent initiatives and scholarly activities that apply to and support institutional programming. Platforms inherently represent cross-cutting initiatives and programs across FAU. Two of the most prominent and important platforms for FAU are: Community Engagement and Economic Development, and Undergraduate Research and Inquiry. The review team has endeavored to ensure that the APR recommendations in this report are in the context of, and aligned with institutional goals outlined in FAU’s Strategic Plan.

In addition, at this time FAU and all other institutions in the Florida State University System (SUS) are being evaluated in accordance with the Board of Governor’s Performance Funding Model. This model uses metrics, such as the six-year graduation

rate, and the second year retention rate of first time in college (FTIC) students, to rank all 12 universities in the SUS. Annual state funding is then allocated in such a way as to reward those institutions that performed best. Institutions that do not perform well in the Performance Funding Model may have state funding withheld, and furthermore existing funds can be sequestered. The review team have also attempted to be mindful of these pressures in this report.

The review team perceived several key areas of concern and potential opportunities that were identified in the self-studies and expressed by the Department Chair, College Dean, faculty, and students during the review team's site visit. These broadly included the need for: **1) identifying a coherent Department mission, 2) enhancing marketing, outreach and recruitment efforts, 3) increasing research activity in the Department, 4) restructuring of instructional workloads, advising, and curriculum, and 5) meaningful analysis and use of data for continuous quality improvement.** These will be addressed in turn in the recommendations section below.

RECOMMENDATIONS

1) Identifying a Coherent Department Mission

The Department and the College of Education understand the importance of identifying a coherent and distinctive mission consistent with FAU's new Strategic Plan and overall University goal of becoming a Tier 1 Research institution. The College has strong, proven and established leadership in place, in the Department Chair, Dean, and Associate and Assistant Deans. The College leadership has an opportunity for restructuring of departments within the College of Education to tie into the FAU *brand* and take advantage of FAU's STEM and research focused aspirations and goals. Specifically, the review team recommends that the ***Department of Teaching and Learning (DTL) and the Department of Curriculum, Culture and Educational Inquiry (DCCEI) be reunited, and renamed to better reflect the unified Department's mission.*** These two departments share programs and teaching missions. Such a union could streamline and enhance faculty workloads and research in both departments. ***A stronger and more prominent emphasis on STEM education could be focal to the new Department's mission.***

2) Enhancing Marketing, Outreach and Recruitment Efforts

The Department and College have a unique opportunity to differentiate their programs from those offered at other regional institutions by promoting and embedding an emphasis on STEM in these programs. ***Embedding more research and STEM training into each undergraduate program*** will, in the long term, help attract better and more students into this Department and College.

Further specific suggestions for marketing, outreach and recruitment are:

- (a) DTL faculty should be encouraged to spend a day(s) a year in a school meeting and interacting with both students and administrators – e.g., joining in math club activities, conducting a mathematics class, singing with the chorus or choir, playing in the band, giving an interesting experiment in chemistry, etc. This kind of presence can be very useful as outreach and pay off in terms of enrollments later.

- (b) The Department's excellent newsletter should reach all schools in the area, and perhaps students in those schools. A student friendly newsletter can be very useful for recruitment.
- (c) Try to devise ways in which student teachers can interact with other teachers and parents, providing them with useful information about FAU and its program(s). For example, a small, pocket-sized, several-fold "facts brochure" giving pertinent information about FAU or a particular program could be handed out by faculty and others when in schools, open houses, etc.
- (d) Make in person visits to guidance counselors in schools within a certain radius of the college. Make sure they have brochures, scholarship opportunities, and info about the department/college/university. Be known to local guidance counselors that have tremendous influence with some students when it comes to choosing a college.
- (e) Have current students make return visits to their former high school campuses and meet with students about attending the university or coming to the campus for a possible visit.
- (f) Establish a presence at conferences for current school teachers so that you can explain the benefits of the department and college. Or have professors give talks or offer professional development at area schools, enhancing department/college/university visibility.
- (g) Offer summer programs where high school juniors can enroll in classes for college credit in the department/college/university.
- (h) Offer dual credit classes/courses that school students may take that will give them not only high school credit but also college credit.
- (i) Devise new ways that scholarship opportunities are advertised and provide prospective students help in finding scholarship opportunities in the department/college/university.
- (j) Since many students choose their college/university based on a "feeling" they have about it, plan parent-student visits to the department/college/university.
- (k) Organize an honors program on campus for 11th grade students going into their senior year that is, say, a three-week program in the summer. Students apply, having to have a particular grade point average, ACT score and/or letters of recommendation. If accepted they take rigorous courses and participate in enriching activities while staying in college dorms. This should be a free program and if the students complete the program they receive college credit and are guaranteed some scholarship support if they attend FAU. Students who participate in this program can be invited back "x" times during their senior year to reunions with fellow students.

3) Increasing Research Activity in the Department

The Department seeks to increase its research activity and aspires toward a Tier 1 research level. Faculty mind-set in the Department needs to be thoughtfully and progressively scaffolded into such Tier 1 aspirations. Faculty in the Department should be encouraged to *proactively seek more research collaborations* with faculty in the Colleges of Science and Engineering at FAU, and at other institutions. These collaborations can create stronger research studies that combine DTL faculty's expertise

in instruction and learning with colleague's expertise in STEM issues. DTL faculty members can benefit by working with investigators more seasoned in preparing external research grants. Faculty could also better capitalize on naturally occurring working relationships with school districts in South Florida to facilitate research projects (as discussed above). ***More funding is needed for faculty travel*** to present research at conferences and workshops, and for networking purposes. The College Dean generously (at a time where FAU budgets are tight) allows up to \$1100/year for such faculty travel, but more is needed, and particularly assistant professors should be encouraged to attend national conferences of research oriented organizations such as AERA. This is critical for achieving higher research productivity.

Faculty need to be encouraged to submit more grant proposals to federal funding agencies. The Department Chair has led the way in obtaining extramural funding. She is currently PI of the multimillion dollar EXCEED grant and has a track record of securing external funding. To achieve broader long term sustained success for more faculty achieving extramural funding, FAU must ***improve grant infrastructure*** at the Department, College, and University levels. We recommend that seed funding programs emphasizing/requiring collaborative projects be implemented, and that a small portion of indirect costs from funded grants be used to build a better infrastructure (College- or University-wide) for grant preparation and administration. The Department needs a dedicated grant facilitator to help more faculty submit funding applications to external agencies such as NSF, IES, Spencer Foundation and other funding agencies.

We also recommend that faculty be provided other incentives to help them prepare and submit grant proposals for consideration by external funding agencies. A great deal of time and effort goes into devising research paradigms, conducting literature reviews, planning for statistical analyses and result interpretation, etc., in the proposal preparation process. We suggest that submitted grant proposals be more significantly factored into annual merit considerations. Faculty who are successful in obtaining extramural funding could be awarded part of the indirect costs garnered by funded proposals (~10% - 15%). Once such incentives and resources for research are increased then the Department Chair could consider modestly increasing research expectations in terms of the quality of research outlets (journals in which faculty publish) and number of grant proposals submitted by faculty.

A ***formal mentoring program*** for junior faculty is needed in the Department to help junior faculty quickly and fully achieve their potential in research, teaching and service. Mentoring by colleagues from other institutions as well as from FAU is encouraged. In lieu of funding being available for a Departmental Mentoring Program, the Department Chair could facilitate formal teaming-up of junior faculty with senior mentors and directing such teams to apply into FAU's formal mentoring program. The aims of the FAU mentoring program are to help train junior faculty in writing grant proposals and conducting research. Individuals who have been successful in obtaining grants and conducting funded research are the most desirable mentor candidates.

Reducing faculty teaching loads will give faculty more time for creative and scholarly activities discussed above. Faculty teaching loads appear to be very high currently despite the large number of adjuncts employed in the Department. Strategies for reducing teaching loads are discussed in Recommendation 4 below.

The absence of a PhD program is a serious impediment to the Department's efforts to increase its research activity and aspire toward a Tier 1 research level. PhD students working with PIs on research projects will help to considerably advance the Department's research mission. The Department can ***develop and implement a new PhD program*** (in addition to its' pre-existing non-thesis MS programs) or, once DTL reunites with DCCEI, faculty in DTL will be able to mentor more graduate student researchers in the PhD program that is currently housed in DCCEI.

The Department needs to ***recruit and better train more young faculty*** from outstanding doctoral programs who will arrive at FAU with the beginnings of a research program already in hand (i.e., their dissertation research). New faculty should be provided competitive start-up packages that include graduate research/teaching support, reduced teaching loads, summer salary for the first two years, possibly funding to organize a regional workshop or meeting to establish collaborative connections, and enhanced infrastructure for grant preparation (discussed above) to start developing and submitting proposals for funding teacher enhancement and research projects. New faculty should be immediately introduced to local and state level funding agency representatives to help them explore "seed" funding opportunities. These projects can then be expanded and will have enhanced chances of success when submitted for funding consideration to federal agencies or private foundations.

4) Restructuring of Instructional Workloads, Advising, and Curriculum

The review team was surprised by the high teaching loads of most tenured and tenure-track faculty in the Department. The standard teaching load was confirmed to be a minimum of 3 courses in Fall and 3 courses in Spring. Such high teaching loads can leave faculty very little time for creative and scholarly activities such as mentoring student researchers or writing grants and papers. The Department Chair and Dean are aware of this problem and, at the time of the site visit, were in the process of reducing faculty teaching loads. During the site visit, the review team also met a couple of extremely well qualified and enthusiastic adjuncts in the Department. It is the review team's recommendation that the ***teaching loads of faculty be significantly reduced***. This can be done by: 1) performing a careful assessment of courses to see if there is a more efficient way to meet curricular or credentialing requirements e.g., reducing the number of required courses by combining content now taught in separate courses, 2) increasing some course caps, 3) restructuring courses to include discussion sections to replace some lectures, with GTAs teaching the discussion sections, and 4) assigning more courses to the ***well qualified*** adjuncts employed by the Department.

During the site visit, the review team met with undergraduate and graduate students in the Department. Students expressed a need for more on-going frequent advising, test practice in preparation for upcoming state required exams. The review team recommends that

faculty *infuse more test questions and practice for state required exams into their courses, earlier in the program and repeatedly*. Also, *a restructuring of advising* within the Department and College could enhance the advising experience for the students and relieve faculty of much of the on-going advising burden. The College has a team of non-faculty advisors that could proactively work with faculty and students to facilitate better communication of important program and course related information, deadlines, and expectations. In addition, much of the information the students need regarding state and FAU requirements for their programs could be provided to them in a folder.

The review team recommends that each undergraduate program include *more course work taught by faculty directly from the disciplines*, such as math or the sciences. It is important that future teachers are qualified and knowledgeable in content well above the level that they will teach in these disciplines. This could be achieved by redeveloping courses to include math and science departments, and cross-listing these courses in the university catalog e.g. math and education, science and education, etc. This approach would fit in well with a STEM emphasis in the Department.

To achieve an enhanced undergraduate research culture the Department could better utilize the Office of Undergraduate Research and Inquiry (OURI) at FAU. Faculty could be given incentives (through the annual evaluation process and/or promotion and tenure considerations, and reduced teaching workloads) to increase their mentoring and training of undergraduate researchers. This would lead to more undergraduate research students applying for OURI research grants, and presenting at the Annual OURI Undergraduate Research Symposium, and perhaps regionally and nationally. The Department could better promote training and development opportunities annually offered by OURI to their students, and then work on developing more education-specific extracurricular training opportunities for their students. Also, establishing an academic student club or clubs for “future teachers” could better facilitate student-faculty interactions and connect students to the Department. Academic student clubs at FAU are: 1) discipline focused, 2) require a faculty advisor, 3) well-funded through the student government, and 4) enable students to build their leadership and professional skills by organizing and participating in regular social and professional development events with faculty. Collectively these efforts would markedly improve the research culture in the Department and help the Department become even more student-centered.

Embedding STEM into curriculum of most undergraduate programs in the Department would require a thoughtful curriculum restructure. We recommend that more *connections with faculty in other STEM departments across FAU* be established and maintained for teaching and research purposes, specifically in: mathematics, chemistry, physics, biology and engineering. We recommend that cross department appointments with the colleges of science and engineering be considered. Embedding STEM throughout the curriculum of programs that train future elementary and secondary teachers may give them a more positive attitude toward STEM subjects, and enhance their practical STEM skills and knowledge. In turn better STEM trained teachers will be able to better prepare our children for an increasingly competitive and STEM-oriented future workforce.

We recommend *that faculty also seek more research collaborations and partnerships with school teachers* focusing on: curriculum development, changing attitudes toward math, beliefs about math, problem solving, methods of teaching, appropriate use of technology in classroom teaching and learning, etc. The Department's EXCEED grant provides a wonderful entry for faculty to initiate and pursue such research in addition to teaching enhancement in South Florida schools.

5) Meaningful Analysis and Use of Data for Continuous Quality Improvement

The Department and College are recognized regionally and are the first in Florida to obtain accreditation from the Council for Accreditation of Educator Preparation (CAEP). This is a significant achievement and offers FAU a leading edge in the region for recruiting and marketing purposes.

The Department struggles with timely data access and analysis for accreditation and continuous quality improvement purposes. The Department may have to work on *building working relationships with FAU's Institutional Effectiveness and Analysis (IEA), school districts, and US Census Bureau* to source and gather data more quickly and effectively. This is a great challenge.

The Department may also consider implementing an *evaluation of their students' basic computational skills* as pre-tests in courses in their programs. This would allow course instructors to adapt course content to the specific learning needs of any given student cohort, in turn leading to better learning outcomes and student success. Any potential funding agency, *and its reviewers*, will look favorably on this (i.e. evaluation of student basic computational skills and a proactive approach for amelioration of deficiencies) since the problem of students' weaknesses in basic skills is ubiquitous across academic institutions. Another suggestion is to develop a remedial boot camp for the lowest performing students or take advantage of the pre-existing "math boot camp" at FAU.

CONCLUSIONS

The Department of Teaching and Learning is regionally and nationally recognized, receiving glowing evaluations and praise from the national accrediting agency, CAEP. The Department's APR self-study documents were stellar in many respects and demonstrate that the administration and faculty are clearly in touch with the main strengths and opportunities that already exist for change, and the weaknesses and "threats." It will be necessary to address these with resources and personnel in order to move to a higher tier. Overall, the analyses done at FAU by administrators, faculty and staff show they know what has to be done and how to do it. Finally, the FAU *brand* focuses on STEM, as outlined in FAU's Strategic Plan. The Department and College have an opportunity to closely identify with and market that *brand*, and be the first in the region to comprehensively enrich the preparation and education of elementary and secondary teachers with a deeper knowledge of STEM curricular content.