AC 2011-1840: ADVANCE-PURDUE: RETENTION, SUCCESS AND LEAD-ERSHIP FOR SENIOR FEMALE STEM FACULTY

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ADVANCE-Purdue: Retention, Success and Leadership
for senior female STEM faculty

Abstract

ADVANCE-Purdue is an NSF-funded institutional transformation project designed to increase the presence, retention and success of STEM female faculty. The Purdue Center for Faculty Success (PCFS), the core of ADVANCE-Purdue, focuses on developing programming and implementing activities for the success of all faculty designed around three goals: 1) to increase the number of women of color in STEM faculty positions, 2) to improve the success of all women STEM faculty, and 3) to engage all faculty in transforming the institution. ADVANCE-Purdue continually provides the campus leadership with evidence of program effectiveness that will offer a basis for campus-wide changes to policy and practice.

Ultimately, PCFS seeks to support *all* women faculty in their career paths and hence developed the Leadership Institute (LI). The goal of the LI is to provide leadership development opportunities and enhance the success for post-tenure faculty, with a focus on STEM female faculty, through career coaching. The first coaching cohort of female post-tenure STEM faculty began in the spring of 2010. Initial reaction was positive and the cohort decided to continue in 2010 - 11. Due to popular demand, a second cohort was also established in fall 2010. This paper will discuss the motivation, implementation, initial assessment, and future plans of the Career Coaching Cohorts. Evaluation data and participant demographics will be presented.

Introduction

Women have been present in the academy for years, but their numbers remain stunningly low. Much work has been done to increase the number of female professors, especially in the STEM disciplines where their numbers are the lowest, but the increases have been steady but slow.[3] Also, women faculty continue to lag behind their male colleagues as they move up the academic ranks.[6] With this small pool of women, it is understandable that there is an even greater challenge for women to become institutional leaders (Bilen-Green et al. provide an overview of women in academic leadership positions[1]). Over the past 30 years, much work has been done in this areas such as Sandler's "chilly climate" model where she explains that the climate becomes colder at the top and the few women who 'make it' become more isolated and more visible for scrutiny.[5] Valian explained that men and women have implicit hypotheses about gender differences which result in an accumulation of advantage for men and disadvantage for women.[7] The consequence is that men tend to be overrated and women underrated. Furthermore, Valian concludes that gender schemas guide our perceptions and evaluations, making it harder for women to succeed than men.[8] The bottom line is that institutions, rather than the women themselves, need to make efforts to increase gender equity. That being said, women preparing for or desiring to secure leadership positions can be proactive in their quest and seek out a coach to help them structure their career goals. Career coaching places the *individual* at the forefront and fosters the development of personal and professional objectives and outlines manageable steps to make identified goals a reality. Career coaching is of particular benefit to faculty women especially in the STEM fields given the slow institutional changes toward gender equity

in high level positions. Women in the academe need to be well prepared as they make life changing career decisions. The Career Coaching Cohort offers expert personal and career development advice coupled with the cohort shared experiences. The goal of the program is to propel the participants toward professional advancement with the personal and career vision they have created for themselves. Consequently, the Career Coaching Cohort is the hallmark of the LI and one vehicle to increase the gender diversity in the university's leadership.

Coaching Model

The cohorts bring together small groups of tenured female faculty on a regular basis. These unique cohorts are led by an internationally renowned executive and coaching expert Susan Bulkeley Butler. Butler, an alumnae and former Trustee of Purdue University, was the first female partner at Accenture – a global leader in management consulting – and a published expert on career coaching. Butler also established the Butler Center for Leadership Excellence on Purdue's campus. She brings to the academy her proven business world perspective on career advancement and leadership. Each cohort is limited to 10 participants, and meets monthly for group discussion and personal career coaching. The cohorts utilize a networking mentoring model by establishing mutually beneficial relationships.[4]

The coaching cohort model is two pronged: first, Butler shares her leadership and career success acumen to facilitate self discovery and goal planning while offering tangible and relevant strategies for career progress to the coaching cohorts; second the cohort sessions offer an opportunity for participants to share their own wisdom about faculty advancement and become a valuable source of information and support for one another. The main focus of the cohort is coaching, which is directed and performance-oriented with the purpose of facilitating the achievement of specific goals. The secondary benefit is the opportunity for the participants to establish peer mentoring relationships. Mentoring in this case plays a different role than coaching. Mentoring is a holistic endeavor and the participants are free to choose or not choose to establish a mentoring relationship. Mentoring typically is a broader endeavor including counsel, support, promotion, an advice about the culture of an organization[4]. The participants of the Coaching Cohort get the benefit of both.

At the core of Butler's career success model is: "… having a proactive orientation to getting whatever it is you want…" [2] This is accomplished by implementing the four elements of Butler's program: envision your future, recruit a team to support your vision, develop your plan, and navigate your journey. Butler's *Make-It-Happen* Model situates each individual at the helm of her career, while the cohort experience provides the participants various perspectives about career success in the academy.

Assessment

The assessment of this program is currently in the formative stage and a summative evaluation will be conducted in year five of the grant. A pre and post assessment is conducted to ensure that both programmatic goals and individual participant expectations are being met. Prior to the first coaching session a needs assessment was developed to gather specific information from each participant about their expectations of the cohort sessions and what topics they would like

discussed. This information was shared with Butler so the sessions would be relevant and meaningful. As sessions unfolded the content and format were adapted to the needs of the group. Near the end of the first semester, Butler was interviewed about her perceptions of the group and also gave input for a post semester survey to see if the topics and session format were beneficial for the group. The survey, consisting of rating items and open ended questions, was administered at the last session and was also available online for those who could not attend.

Assessment Discussion

Coaching Cohort A began meeting during the spring 2010 semester. Cohort A consists of seven participants; three are full professors and four are Associate Professors; one is a Department Head, one is an Associate Department Head and one is an Assistant Dean. All are faculty in STEM departments across campus.

Prior to the first meeting, participants responded to three open-ended questions; Cohort members were asked to: (a) list what they hoped to gain from participation, (b) what topics they would like to discuss and (c) what resources and skills are important for future career success. The most prominent theme from the responses was the desire to enhance leadership skills. Also cited were: developing effective career management strategies, gaining professional advice through mentoring, and learning new self improvement skills (see Table 1). In addition to leadership, participants wanted information about how to negotiate various aspects of the workplace to create an environment conducive to attain their goals. These included interpersonal relationship skills, equity in the workplace, prioritizing commitments and gaining promotion. Finally, participants indicated the following skills and resources as important to their career success: leadership skills, funding (generally and for career development), skills to appropriately handle 'sticky' situations, organizational skills, and public presentation and interpersonal skills.

A post-survey was administered at the end of the spring 2010 semester. Results generally indicated the coaching experience helped the respondents clarify and articulate career goals. Participants stated that the interactions with both Butler and the other group members were most beneficial. Additionally, these participants appreciated the opportunity to focus on their future career aspirations and tangible ways to achieve identified goals. Respondents stated the coaching sessions provided motivation, direction, and networking opportunities. They also identified important resources for future career success as: time, coaching, funds for research and the skills from Butler's book.[2]

When asked how they would use the coaching techniques with others; they mentioned having more productive interactions with those inside and outside their departments and indicated a desire to share strategies and techniques derived from shared knowledge.

"I have more direction and have some concrete tasks that I would like to accomplish over the next two years" *participant comment*

After their first semester together, Cohort A chose to continue their coaching with Butler for another year. From this feedback, it was decided that cohorts will be asked at the end of each academic year if they would like to remain together for another academic year. Due to popular

demand, a second coaching cohort (cohort B) was started in fall 2010. Cohort B is comprised of eleven STEM female faculty from across campus. Five are full professors and six are Associate Professors; one is an Associate Dean, one is an Assistant Department Head, and one is a Distinguished Professor.

Prior to their first meeting cohort B members were asked to list what they hoped to gain from participation. These themes emerged: networking, learning techniques for productive decision making when planning for the future, and work life balance (see Table 1). The participants were also asked what topics they would like discussed. These included: how to develop communication strategies for difficult situations, how to synthesize advice from various "mentors", how to implement proactive strategies for career success, and work-life balance. This cohort identified these skills and resources as important to future career success: communication, time management, surrounding yourself with people who support your vision, and networking. Post-surveys will be conducted with cohort B at the conclusion of the academic year.

Table 1: Cohort A and B coaching expectations.

Participants Coaching Cohort Expectations	Cohort A	Cohort B
Enhance leadership skills	X	
Develop effective career management strategies	X	
Gain professional advice through mentoring	X	
Learn new self improvement skills	X	
Network with colleagues		X
Learn techniques for productive decision making when planning for the future		X
Consider work/ life balance issues		X

Each cohort had different expectations about what they hoped to gain from attending the Coaching Cohort (see Table 1). The more experienced cohort A was especially interested in enhancing leadership skills and career management; whereas cohort B tended to be more interested in solidifying a strong base to launch their careers. A key strength of the PCFS coaching cohort program is in its flexibility that allows the unique characteristics of the cohort members, individually and as a group, to shape the implementation, format, and content of the sessions to meet the needs of this talented pool of individuals.

Moving Forward

As the cohort sessions continue, additional surveys and interviews will be conducted to track the participants' coaching experiences. Additionally, discussions are under way to design a "best practices" guide on academic career development to assist women faculty members and to also inform institutional policy. The interest in producing this manual stems from the cohort participants' desire to share their career aspirations, challenges and lessons learned with their female colleagues in the hope that all can benefit from each others' experiences.

The coaching cohort program will continue through the duration of the grant, and is planned to be included in the sustainability proposal. Each year, more cohorts will be established on an as-needed basis. The coaching cohort is the central component of the Leadership Institute which is

designed to increase confidence in professional success, awareness of leadership opportunities and perception of professional support.

Acknowledgements

References

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