

The Development, Implementation, and Assessment of an Innovative Faculty Mentoring Leadership Program

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Abstract

Effective mentoring is an important component of academic success. Few programs exist to both improve the effectiveness of established mentors and cultivate a multispecialty mentoring community. In 2008, in response to a faculty survey on mentoring, leaders at Brigham and Women's Hospital developed the Faculty Mentoring Leadership Program as a peer learning experience for midcareer and senior faculty physician and scientist mentors to enhance their skills and leadership in mentoring and create a supportive community of mentors. A planning group representing key administrative, educational, clinical,

and research mentorship constituencies designed the nine-month course.

Participants met monthly for an hour and a half during lunchtime. Two cofacilitators engaged the diverse group of 16 participants in interactive discussions about cases based on the participants' experiences. While the cofacilitators discussed with the participants the dyadic mentor-mentee relationship, they specifically emphasized the value of engaging multiple mentors and establishing mentoring networks. In response to postsession and postcourse (both immediately and after six

months) self-assessments, participants reported substantive gains in their mentoring confidence and effectiveness, experienced a renewed sense of enthusiasm for mentoring, and took initial steps to build a diverse network of mentoring relationships.

In this article, the authors describe the rationale, design, implementation, assessment, and ongoing impact of this innovative faculty mentoring leadership program. They also share lessons learned for other institutions that are contemplating developing a similar faculty mentoring program.

Effective mentoring is an important component of academic success, but few programs exist to both improve the effectiveness of established mentors and cultivate a mentoring community. Using an innovations framework,¹ we present here the rationale, design, implementation, evaluation, and ongoing impact of the Faculty Mentoring Leadership Program (FMLP) at Brigham and Women's Hospital (BWH).

Existing Mentoring Programs

Mentors can facilitate the establishment of their mentees' career priorities and trajectories, and the presence of a mentor is highly predictive of an individual's success in producing publications, obtaining grants and leadership roles, advancing in academic rank and income, and overall job satisfaction.²⁻⁵

These recognized benefits of effective mentoring have prompted a number of institutions to provide career development sessions on various components of mentoring. The majority of these programs come in the form of single presentations by a notable clinician or researcher imparting his or her wisdom on the topic. Although evaluations of the content and quality of these programs are often favorable, the format (e.g., typically one or two didactic presentations given during an hour) limits both the amount and depth of information that presenters can share and the opportunity attendees have to robustly explore, discuss, or challenge the information presented. In addition, these forums are seldom the best venue for discussing complex or difficult individual mentoring issues because of confidentiality concerns. Such programs also frequently lack mechanisms to encourage open and ongoing dialogue among attendees that would promote the development of a community of interested and interconnected multispecialty faculty mentors.⁶

In response to these issues, a number of academic health centers, medical schools, and research and policy institutions,

including the National Institutes of Health, the Institute of Medicine, and the Association of American Medical Colleges, have developed coordinated, multisession mentor development programs for clinical, translational, and basic science faculty.^{7,8} Many of these programs focus primarily on junior faculty at the early stages of an academic career in translational or basic science research.⁹⁻¹² When programs are directed toward midcareer and senior faculty, they tend to focus on engaging experienced clinicians with no prior mentoring experience.¹³ A few programs, such as the Mentor Development Program at the University of California, San Francisco, School of Medicine⁷ and that at the Cleveland Clinic,⁸ however, do attempt to train established clinical and translational research faculty to become more effective mentors.

Still, existing mentor development programs tend to promote mentoring relationships that focus primarily on the development of a single, one-to-one, mentor-to-mentee, relationship. In addition, existing programs more often focus on the development of a particular group of mentors within an individual silo, such as those dedicated to

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bench-top or clinical research or within a specific department or discipline.¹⁴ As a consequence, these programs neither encourage mentors to serve outside their specific lab, division, or department nor engage them to learn from fellow mentors in other roles (e.g., administration, teaching) who may offer other viewpoints or approaches to similar issues. In this way, these programs do not facilitate the creation of a broader, more interactive, community of mentors.

Emerging evidence, particularly from the business community, indicates that partnering with multiple mentors significantly benefits mentees.^{15–17} The rapid evolution and complexity in medical knowledge, the subsequent growth of subspecialization, and the mobility and globalization of the medical workforce all require mentoring networks with individuals from different spheres to optimally develop different facets or roles within a mentee's career.^{16,18,19}

The FMLP

Recognizing the need to provide a comprehensive and coordinated approach to professional development and career advancement across the academic continuum at BWH, institutional leaders created the Center for Faculty Development and Diversity (CFDD) in 2006. A CFDD faculty survey on mentoring activities conducted in fall 2008 indicated that the majority of respondents, particularly the junior faculty, wanted a formal mentor but did not have one. Among the senior faculty respondents serving as mentors, they perceived their effectiveness to be limited by an absence of dedicated time and formal training in mentoring. The CFDD sought to create a program that would increase the quality of mentoring relationships, emphasize and encourage leadership in mentoring, and cultivate a vibrant, interdisciplinary community of faculty mentors at BWH.

Development and implementation of the FMLP

A planning group, consisting of the CFDD executive director (A.H.), who had extensive experience with mentoring in the business world, and three experienced faculty members (J.F.B., C.C.N., E.W.S.), all of whom had won major Harvard Medical School (HMS) mentoring awards and represented key administrative,

educational, clinical, and research mentorship constituencies, developed the idea for the FMLP.

We conceptualized the FMLP as a peer learning and skill development experience for individuals who were already serving as mentors, and we patterned the course on two successful and ongoing CFDD-sponsored leadership programs. These programs (Brigham Leadership Program, 10 full-day sessions across an eight-month period; and Brigham Research Leadership Program, 9 two-hour sessions across an eight-month period) were developed in 2007 and involved cross-departmental cohorts of individuals who met on a regular basis for several months.

FMLP applicants are required to be BWH faculty with a minimum HMS rank of assistant professor and at least five years of experience in mentoring other faculty members on a regular basis about career development, medical school promotion, hospital advancement, and/or their research and clinical careers. Applicants also are required to submit a letter of nomination and support from their department or division chair or laboratory supervisor. We do this to obtain more information about the applicant's current mentoring impact, as well as to create awareness, among the applicant's departmental leadership, of potential future mentoring opportunities. The planning group is responsible for reviewing all applications and selecting the cohort of faculty participants.

We structured the FMLP as 9 one-and-a-half-hour lunchtime sessions held monthly from October 2009 through June 2010, with two cofacilitators of different sexes and from different departments. Applicants had to agree to attend all of the sessions. Sessions focused on a predetermined topic based on our review of the mentoring literature and were predominantly case based (see Table 1); however, we did not decide on the specific subthemes and cases until we determined the participants' specific needs. Cases were discussed either in small breakout subgroups or amalgamated into composite cases by the planning group for discussion with all participants (see Box 1). We charged participants with contributing subthemes and cases from their experiences as mentees and mentors,

recommending additional reading materials, and participating actively in honest conversations about their own mentoring experiences. To facilitate open discussion, we also required that participants agree to maintain strict confidentiality regarding the specific cases and individuals they discussed. Finally, participants summarized key lessons from each session, which we then collated and reviewed with them at the start of the next session.

The planning group met between sessions throughout the course to review the prior session's evaluations, consider the submitted cases, develop deidentified composite cases related to the next session's topic, select the reading materials, and design the next session's program. Although we intentionally limited the number of outside speakers whom we invited in order to preserve the intimate nature of the group, we did include guest speakers with specific expertise (e.g., mentoring across racial differences, departmental mentoring programs) for select sessions. They, too, presented their information in a case-based format. Approximately two weeks before each session, we distributed a summary of the topic themes from the preceding session, as well as the agenda, assignments, and reading materials for the next session. HMS also provided continuing medical education credits for each session. Over the course of the year, we assembled the preliminary materials for a mentoring tool kit from cases discussed during the course, reading materials, and the key lessons, and we made the information available to all BWH faculty on the CFDD intranet.

Assessment and evaluation of the FMLP

The Partners human research committee granted ethical approval for our analysis. We evaluated the data that we collected from five course assessments using a Wilcoxon rank-sum analysis, and we report here the results as mean scores (standard deviation [SD]). All results reported here are statistically significant at $P < .05$.

We asked participants to complete three self-assessments and two course evaluations. We sent a precourse, baseline self-assessment survey to each participant to examine the depth and duration of his or her mentoring experiences, the number of hours per

Table 1

The Faculty Mentoring Leadership Program Session Topics, Quality Ratings, and Content, Brigham and Women's Hospital, 2009

| Session topic | Postsession rating of overall quality (no. of respondents)* | Session content |
|---|---|--|
| Orientation: What is mentoring? | 4.55 ± 0.51 (13) | Mentoring definitions and models; optimizing methods to provide and receive mentoring |
| Structuring the mentoring relationship | 4.40 ± 0.69 (12) | Matching mentors/mentees; establishing expectations and boundaries; mentoring contracts |
| Difficult and/or complex mentoring situations | 4.67 ± 0.70 (11) | Discussion of participants' mentor or mentee "disasters" |
| Mentoring programs | 4.00 ± 0.82 (12) | Discussion of existing hospital and departmental mentoring models; developmental network exercise |
| Life course of mentorship | 4.50 ± 0.85 (9) | Transition from mentee to mentor; mentoring symbiosis; comentoring; ending mentoring relationships |
| Mentoring across differences | 4.86 ± 0.38 (11) | Cross-racial, gender, cultural, and generational mentoring |
| Mentoring and your career | 4.46 ± 0.66 (13) | Mentoring career development; financial and organizational support; academic recognition and promotion |
| Mentoring tools and resources | 4.38 ± 0.52 (11) | Developing reference materials and a compendium of cases; questions and teaching points |
| Giving and receiving feedback/lessons learned | 5.00 ± 0 (11) | Feedback versus evaluation; benefits and challenges; course feedback; participant growth |

*Postsession ratings are based on a five-point Likert scale (1 = poor, 5 = excellent) to determine the relevance of the topic and material. Number of respondents is based on a total of 14 participants (not including the two cofacilitators, who did not complete the assessments to avoid bias). Results are presented as means ± standard deviations.

week he or she spent on mentoring, the number of current and past (within five years) mentees with whom he or she has worked, and his or her self-perceived mentoring capabilities and effectiveness. Each participant also completed an evaluation at the conclusion of each session and at the completion of the course, as well as a postcourse self-assessment and a follow-up self-assessment six months after the course ended. All surveys were anonymous to encourage robust and confidential self-assessment and feedback.

Evaluation forms completed at the end of each session assessed the teaching abilities of the facilitators and/or presenters, the relevance of the material, the achievement of the session's stated objectives, and the overall quality of the session. Each also asked for comments on the most and least valuable elements of each session, changes in the participant's professional work as a result of the session, and potential future course topics or suggestions.

Participants represented a diverse group of individuals with technical and/or developmental mentoring expertise in educational, administrative, clinical, and laboratory-based endeavors. The initial FMLP cohort included 16 participants—7 women (44%), 3 from

minority backgrounds (19%), and 12 with an MD degree (75%; 2 held PhDs and 2 held MD/PhDs). Participants represented 8 of BWH's 13 departments and a range of academic ranks (10 assistant [63%], 4 associate [25%], and 2 full [13%] professors).

Postcourse ratings were significantly more positive than precourse ratings, with the largest change in responses to questions on knowledge of hospital resources for mentoring assistance and the smallest change in responses to questions on serving as a mentor to someone of a different race. The sessions that featured case-based group discussions (mean 4.57 ± 0.27 out of 5) consistently received higher ratings than the sessions that were more instructional or didactic in nature (mean 4.34 ± 0.27 out of 5).

Participants' responses to the postcourse self-assessment revealed that their mentoring effectiveness and knowledge had improved significantly when compared with their responses to the precourse self-assessment. Participants also indicated substantial improvement in mentoring confidence level and ability to accomplish mentoring goals (mean 4.4 ± 0.49 out of 5 and 4.36 ± 0.48 out of 5, respectively). Participants' responses to the six-month postcourse

self-assessment indicated that the course had an impact on their effectiveness as mentors (mean 3.5 ± 0.63 out of 4) and their mentoring careers (mean 3.25 ± 0.58 out of 4). We noted favorable responses to questions on learning from mentors with different primary roles (clinical, teaching, administrative, or research), obtaining comfort with complex mentoring issues, and being willing to provide mentoring support or assistance to peers outside one's immediate specialty. Achievements directly attributable to participation in the course included writing manuscripts and giving presentations on mentoring, initiating and improving departmental or divisional mentoring programs, enhancing mentee relationships, receiving nominations for academic mentoring awards, receiving a National Institutes of Health Mid-Career Development Award in Patient-Oriented Research (K24) (one criterion for this award is service as a mentor to junior clinical investigators), and participating as a program facilitator in subsequent CFDD mentoring programs.

Lessons Learned

We incorporated a number of elements in the FMLP that were different from other existing faculty mentoring programs,^{7,13,20} which participants found helpful.

Box 1

Sample Cases From the Faculty Mentoring Leadership Program, Brigham and Women's Hospital, 2009**Mentoring Across Differences: Cross-Generational Mentorship**

With the retirement of a long-standing chief of a small division in your department, Robert, an accomplished clinician who graduated from his residency six years ago and was recently promoted to assistant professor at the medical school, was selected to be the new division chief. Mike and Sally, both associate professors, who have been in the department for 20 years, were passed over for the chief position and resent having to follow the direction of someone more junior to them in experience and academic standing. Because of your involvement in faculty development and mentoring, each of the individuals independently books a meeting with you.

Life Course of Mentorship: Mentoring Transitions

Bill, a young clinical investigator, was confident that he would be senior author on two separate manuscripts resulting from his research, but in the final draft he was surprised and dismayed to find that his mentor, Tom, had been placed in this position. Bill had worked under Tom during his fellowship but had recently joined the faculty as an instructor. Bill developed a computerized simulation system, and publications about this system are important to an RO1 application he is planning to submit. Bill had worked closely with a fellow and a postdoc on both manuscripts and had planned that they would each be first author on one of the manuscripts. When Bill asked the fellow and postdoc how Tom came to be last author, they stated that Tom told them: "You are the first author, so you know best the contributions of all authors. Therefore, you should choose as the senior author the individual you feel has helped more on the project." Bill makes an appointment to meet with Tom.

Challenges in Giving Feedback to Mentees

Though she is a very nice person, the more you get to know your mentee the more you become concerned that she just can't, or won't, do the work necessary to "cut the mustard"—get the job done at a high professional level. Because you can't trust what she produces to be of high-enough quality, you ultimately end up writing most of her papers. You have a regular meeting scheduled with her for next week to discuss the progress of her research and the writing of the manuscripts.

First, we established the FMLP to provide experienced mentors with an educational opportunity to further develop and share their mentoring skills. Doing so was in response to one of the principal findings from a BWH-wide survey on mentoring, but the need for development opportunities for experienced mentors is most likely a widespread and significantly underappreciated need in many institutions. As a community, we should not expect the craft of mentoring to develop without further educational opportunities; in contrast, available to other faculty roles (e.g., clinician, researcher, educator) are an abundance of seminars, conferences, or even degree-granting programs to teach new theories or validated techniques.

We designed the FMLP to engage the experienced mentor. We required active involvement in the creation and discussion of the amalgamated cases to encourage participants to confront issues that are complex, challenging, or controversial. Such issues reflected the many nuances within mentoring that are often recognized only after years of experience. In addition, we subdivided the cohort at most sessions into smaller discussion groups of three to four individuals, which allowed participants the opportunity to more freely share

their ideas and personal experiences. After these discussions, we assembled the entire cohort and had participants from each group summarize the critical lessons or tips learned, which we collated and distributed by e-mail a week after each session. Participants indicated in their evaluations that these discussions were valuable in creating new insights that were measurable, usable, and lasting.

Certain issues appeared to be of the greatest value to our participants, which may reflect gaps inherent in the traditional learn-by-doing style of mentoring education. The two most highly rated sessions were *Mentoring Across Differences*, which highlighted issues in mentoring others from different cultural, gender, generational, and racial backgrounds, and *Giving and Receiving Feedback*, which emphasized how to provide helpful negative feedback within the mentoring relationship. This is consistent with the literature, in which faculty members report difficulties serving as mentors for underrepresented minorities,²¹ women,²² and individuals from different generations,²³ as well as providing effective feedback.²⁴ In contrast, the lowest-rated session was *Mentoring Programs*, which emphasized the programs that are available through BWH or individual

departments. We hypothesize that a significant part of this low rating is due to the didactic and descriptive, rather than interactive, nature of the session.

Second, although we discussed the dyadic mentor–mentee relationship throughout the course, we emphasized the value of engaging multiple mentors and establishing mentoring networks. Initially, we selected individuals from a diverse range of backgrounds, roles, interests, medical specialties, and academic ranks to participate in the course. By involving faculty who were involved in different parts of the academic mission, we exposed participants to a broader spectrum of mentors and mentoring issues. Participants reported a growing recognition that they did not need to feel responsible for a mentee's entire development and that certain issues could, and perhaps should, be referred to other mentors with more specific expertise. We further illustrated the value of multiple mentors by having the cofacilitators of the course serve as coparticipants rather than instructors, which minimized the hierarchical teacher–learner relationship and served as a subtle, but recognized, disruption to the traditional dyadic structure that exists in medicine, particularly between a mentor and mentee.

Third, we attempted to disrupt the silo mentality in medicine,²⁵ in which established mentors traditionally accept mentees within their own department and often according to their desired primary roles (e.g., researcher, clinician, educator, administrator). In its place, we sought to create an interconnected mentoring community by using specific elements of the FMLP to create a sense of familiarity and trust. For example, we designed the course to span nine monthly, lunchtime sessions. We conducted the sessions around a single conference table (with large name placards for each participant), provided lunch, and emphasized confidentiality. These elements created an informal, interactive, collegial environment, encouraged the use of first names, and provided a social venue to discuss mentoring viewpoints, methods, and difficulties. The longitudinal nature of the course fostered the development of trust and facilitated the development of informal, nonhierarchical relationships²⁶; in addition, participants developed a number of collegial and consultative relationships on their own.

Participants cited the development of a communal sense of connectedness as one of the most valuable aspects of the FMLP. They enjoyed engaging with fellow mentors who had a similar commitment to mentoring but were outside their individual realm and, importantly, not personally familiar with their lab, division, or department, which facilitated more frank discussions of difficult mentoring issues. Such discussions served to diminish participants' sense of isolation in handling challenging mentoring issues, as well as to identify how mentoring programs and leadership roles within mentoring could be developed or enhanced. This creation of an interconnected mentoring community will likely enable greater diversity in both formal and informal mentoring relationships; ultimately, it should facilitate medicine's desired transition to an interdisciplinary, team-based approach with integrated research, clinical, educational, and administrative missions.

In this article, we described the rationale, design, implementation, evaluation, and ongoing impact of the FMLP, which was created to enhance the mentoring skills of midcareer and senior faculty physician and scientist mentors. Participants reported substantive gains in their mentoring confidence and effectiveness, experienced a renewed sense of enthusiasm for mentoring, and took initial steps to build a diverse network of mentoring relationships. Building on the success of this pilot, we again offered the course in the fall of 2010 and 2011, each with approximately 16 to 18 participants. When our third cohort finished the FMLP in the spring of 2012, we sensed a growing enthusiasm for the course, based on an increasing number of applicants each year, the positive outcomes attributed to the course both publicly and privately, and the development of a growing, interconnected community of mentors. We will continue to offer and evolve the FMLP annually with the goal of developing a Web-based repository of cases and teaching notes to serve as a mentoring tool kit. Such a tool kit will allow mentors to refresh their own mentoring efforts and develop more extensive department or lab-specific programs of their own. We hope that this description of the FMLP will assist other institutions that are contemplating developing similar mentoring training programs.

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References

- Kanter SL. Toward better descriptions of innovations. *Acad Med.* 2008;83:703–704.
- Breitenbach RA, Zanecchia MD. Enhancing military primary care research. *Mil Med.* 1992;157:364–369.
- Steiner JF, Curtis P, Lanphear BP, Vu KO, Main DS. Assessing the role of influential mentors in the research development of primary care fellows. *Acad Med.* 2004;79:865–872.
- Palepu A, Friedman RH, Barnett RC, et al. Junior faculty members' mentoring relationships and their professional development in U.S. medical schools. *Acad Med.* 1998;73:318–323.
- Haynes BF. Mentoring physician–scientists: Fear of the unknown and scientific opportunity. *Pharos Alpha Omega Alpha Honor Med Soc.* 1997;60:10–12.
- O'Sullivan PS, Irby DM. Reframing research on faculty development. *Acad Med.* 2011;86:421–428.
- Johnson MO, Subak LL, Brown JS, Lee KA, Feldman MD. An innovative program to train health sciences researchers to be effective clinical and translational research mentors. *Acad Med.* 2010;85:484–489.
- Blixen CE, Papp KK, Hull AL, Rudick RA, Bramstedt KA. Developing a mentorship program for clinical researchers. *J Contin Educ Health Prof.* 2007;27:86–93.
- Thorndyke LE, Gusic ME, George JH, Quillen DA, Milner RJ. Empowering junior faculty: Penn State's faculty development and mentoring program. *Acad Med.* 2006;81:668–673.
- Pololi LH, Knight SM, Dennis K, Frankel RM. Helping medical school faculty realize their dreams: An innovative, collaborative mentoring program. *Acad Med.* 2002;77:377–384.
- Illes J, Glover GH, Wexler L, Leung AN, Glazer GM. A model for faculty mentoring in academic radiology. *Acad Radiol.* 2000;7:717–724.
- Morzinski JA, Diehr S, Bower DJ, Simpson DE. A descriptive, cross-sectional study of formal mentoring for faculty. *Fam Med.* 1996;28:434–438.
- Connor MP, Bynoe AG, Redfern N, Pokora J, Clarke J. Developing senior doctors as mentors: A form of continuing professional development. Report of an initiative to develop a network of senior doctors as mentors: 1994–99. *Med Educ.* 2000;34:747–753.
- Roberts SF, Fischhoff MA, Sakowski SA, Feldman EL. Perspective: Transforming science into medicine: How clinician–scientists can build bridges across research's "valley of death." *Acad Med.* 2012;87:266–270.
- Coates WC. Being a mentor: What's in it for me? *Acad Emerg Med.* 2012;19:92–97.
- Stenken JA, Zajicek AM. The importance of asking, mentoring and building networks for academic career success—A personal and social science perspective. *Anal Bioanal Chem.* 2010;396:541–546.
- Cross R, Thomas R. A smarter way to network. *Harv Bus Rev.* 2011;89:149–153, 167.
- de Janasz SC, Sullivan SE. Multiple mentoring in academe: Developing the professorial network. *J Vocat Behav.* 2004;64:263–283.
- Chandler DE, Kram KE. Enlisting others in your development as a leader. In: Rothstein MG, Burke RJ, eds. *Self-Management and Leadership Development.* Northampton, Mass: Edward Elgar Publishing, Inc.; 2010.
- Feldman MD, Huang L, Guglielmo BJ, et al. Training the next generation of research mentors: The University of California, San Francisco, Clinical & Translational Science Institute Mentor Development Program. *Clin Transl Sci.* 2009;2:216–221.
- Coleman VH, Power ML, Williams S, Carpentieri A, Schulkin J. Continuing professional development: Racial and gender differences in obstetrics and gynecology residents' perceptions of mentoring. *J Contin Educ Health Prof.* 2005;25:268–277.
- Kosoko-Lasaki O, Sonnino RE, Voytko ML. Mentoring for women and underrepresented minority faculty and students: Experience at two institutions of higher education. *J Natl Med Assoc.* 2006;98:1449–1459.
- Bickel J, Brown AJ. Generation X: Implications for faculty recruitment and development in academic health centers. *Acad Med.* 2005;80:205–210.
- Bing-You RG, Trowbridge RL. Why medical educators may be failing at feedback. *JAMA.* 2009;302:1330–1331.
- Cassel CK, Reuben DB. Specialization, subspecialization, and subspecialization in internal medicine. *N Engl J Med.* 2011;364:1169–1173.
- Preszler RW. Replacing lecture with peer-led workshops improves student learning. *CBE Life Sci Educ.* 2009;8:182–192.