Evaluating the effectiveness of faculty development program at the College of Medicine, University of Bisha

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Abstract

Purpose: Faculty development activities have been designed to enhance teacher performance at all professional levels. The work aimed to evaluate the faculties’ suggestions for improvement of their academic knowledge and skills in addition to their recommendation about the factors influencing the effectiveness of the faculty development program.

Methodology: This study implemented convergent mixed research methods. We addressed faculty members of the college (43 faculty members). Survey Monkey was used for data collection.

Results: The response rate was 93%. The main responses were that the program was a valuable tool to gain knowledge and skills, reinforce skills in student assessment. It met or exceeded the expectations of the respondents regarding the leadership and management content, the teaching and learning methods, and the improvement of their conduction of different teaching activities. About 40% were satisfied with the research and publication topics raised in the sessions.

Their main recommendations were to conduct sessions like workshops, organize them once or twice per month, and to be alternately between the faculty with a focus on college needs, including updated scientific topics conducted by experts, even external speakers, research and publication, professionalism, and communication skills with the registration of hours by the Saudi medical commission to help faculty promotion.

Conclusion: The Faculty development program is very important in the improvement of the faculty's knowledge
and skills in learning, teaching, student assessment, leadership and management, research, and publication. The recommendations raised by the faculty will be used for the improvement of the future faculty development program.

**Keywords:** Assessment; faculty development program; leadership; professionalism; publication skills; teaching.

**Introduction**

Faculty members are the cornerstone for the accomplishment of any educational institution. They pave the way to transfer the knowledge and skills to their students (Hrnciar and Madzík, 2013). Medical schools assess the faculty members’ effectiveness based on their knowledge, research impact, and clinical experience but not their educational skills. Consequently, we are faced with challenges in the medical education process (Gruppen et al., 2003). A competent scientist or clinician is not unconditionally guaranteed to be a qualified educator (Steinert et al., 2006).

To deal with the rapid innovation in medical education methods, the need for continuous improvement of faculty skills has become an urgent need (Kamel, 2016). Harden and Lilley presented such a vision, supporting faculty members to gain experience in various aspects supporting the educational process. A teacher should be an information provider, facilitator, mentor, curriculum developer, and implementer, assessor, and diagnostician, a role model, leader, scholar, and researcher (Harden and Lilley, 2018).

The World Federation of Medical Education (WFME) suggested the creation of a program to ensure continuous training of medical staff and faculties and integrating into all levels of education, from undergraduate classes to continuous education (Kleinpell et al., 2011). Those programs came to be known as faculty development programs (Steinert et al., 2012).

The simple definition of faculty development is a training activity to enhance the professional development of a faculty member at all levels (Centra, 1978). Many programs were adopted and designed for improving the skills of faculty members’ teaching, learning, research, publication, leadership, management, and professionalism (Sheets and Schwenk, 1990), in addition to deepening their commitment to the organization (Bligh, 2005).

The establishment of a successful FDP is a milestone that is thought to be important for accreditation, accomplishment, progress, productivity, sustainability, and accountability (Hawkins et al., 2015).

There is no one ideal model for FDPs. These programs vary in structure and function according to institutional needs. An efficient FDP should be based on the needs assessment and stakeholders' requirements. It should also respect the institutional infrastructure, available human resources, as well as financial aspects (Lancaster et al., 2014).

Kirkpatrick designed a four-level evaluation model for any program outcome. The first level is satisfaction data. The next level is cognitive learning data. The third level measures performance data. The final level is results data, which focuses on the influence of an FDP on the learner’s career (Kirkpatrick, 2006).

With this background in mind, we designed this study as the first level of Kirkpatrick’s evaluation model, to focus on the strengths and weaknesses in the FDP of a new medical college in KSA embracing innovative teaching and learning tools.

This study aims to evaluate the effectiveness of the adopted FDPs according to the faculty members’ perspectives, using self-administered questionnaires and analyzing their suggestions for improvement.
Methods

1. The subjects:
   - The included sample size was 43 faculty members.
   - Members working in the college for more than one academic year were included.
   - Those who had joined the college recently (less than one year) were excluded.

2. The methods:
   - An online Monkey survey was disseminated among the participants.
   - The questionnaire was validated through its perusal by the medical students, interns, and medical educators.
   - The questionnaire was checked for item appropriateness and comprehensiveness through face and content validity.
   - A five-point Likert scale (0 = strongly disagree, 4 = strongly agree) was adopted within the questionnaires.

3. The study design:
   A convergent mixed research design was used.

4. The statistical methods:
   Statistics were performed by the Survey Monkey website.

5. Ethical approval:
   The study is approved by the ethical committee of the College of Medicine – University of Bisha [UBCOM/H-06-BH-087 (04/21)]. Acceptance of the faculty to be enrolled was considered as informed consent (Kusumawati et al., 2019 and Wihardja et al., 2019).

Results/Analysis

There are 43 faculty members in the UBCOM. Forty participated in this study, with a response rate of 93%. An online survey link (quantitative and qualitative) was sent to the faculty members via their official mail.

The study revealed that the majority of the faculty believed that the knowledge and skills gained during FDP sessions helped them with their academic work in the college (Figure 1).

**Figure 1**: Response regarding the knowledge and skills gained from the FDP
In Figure (2-A), we can see the results regarding faculty members’ opinions of the frequency of FDP sessions to be 1 to 2 sessions per month.

The faculty members showed enthusiasm for rotating the preparation and presentation of different topics covered by the FDP between them to create a community of practice (Figure 2-B).

It is noteworthy that the majority of faculty with different specialties, from different medical schools, and with diverse experiences supported the idea of interprofessional education (IPE) (Figure 2-C).

**Figure 2:** Faculty response regarding the organization of the sessions

A: Response of faculty members regarding the frequency of FDP sessions,
B: Perspectives about all faculty members sharing in the preparation and presentation of different topics in the FDP

C: Response about the improvement of IPE that was achieved by FDP

Regarding the leadership and management topics presented in the FDP, the majority of faculty considered them to exceed or met expectations (Figure 3-A).

It noteworthy that the faculty found that material about teaching and learning tools presented in the FDP helped them to improve their academic performance (Figure- 3B).

**Figure 3:** Faculty response regarding the content

A: Feedback about the leadership and management topics that were raised in the FDP sessions

B: Opinion of faculty members regarding the teaching and learning tools coverage by the FDP sessions

The study revealed that 72.5% of the faculty supported the idea that the FDP improves skills for student assessment (Figure 4-A).

It seems that the FDP needs to address the area of research and publication more deeply as less than half of the faculty agreed that the FDP improved their research and publication skills (Figure 4-B).

**Figure 4:** Faculty response regarding the skills
A: Feedback about the improvement of student assessment skills from the FDP sessions

B: Research and publication skills’ improvement by the FDP

A hands-on culture prevailed among the medical staff of the UBCOM as 84.6% preferred interactive sessions with workshops rather than lectures (Figure 5).

**Figure 5:** Preference of workshops in FDP sessions
Finally, we checked suggestions for improvement by qualitative questions and refined, coded, and analyzed the responses. Based on the number of responses, the two main suggestions were:

1) To hold the FDP once per month.

2) To focus on college needs and include updated scientific topics.

The second highest suggestion was to focus on research and publication. The third highest suggestions were for tutors, rather than the quality committee, to select session topics and for experts, even external speakers, to conduct sessions. The lowest number of suggestions was for all the FDP sessions to be interactive, for registration of the hours in the Saudi commission for health to help the promotion of the faculty, and for more focus on professionalism, communication skills, and ethics.

**Discussion**

Health professionals' education is a difficult and important task performed by an FDP. Most faculties and schools develop an official FDP to ensure the continuous development of their staff members' clinicians (Steinert, 2014).

Variable assessment tools are used to evaluate FDPs and activities. Questionnaires, interviews, observations, focus groups, student assessments, and faculty reports are widely accepted. Many studies have advocated the usage of questionnaires for their psychometric advantages (Gibbs and Coffey, 2004). This study used one to assess the FDP in a new medical college.

This study proved that the majority of the faculty believed that the FDP improved their teaching, learning, and
student assessment skills. In one review, Glowacki-Dudka and Brown (2013) stated that medical FDPs are beneficial for staff members through self-evaluation of teaching skills, recognition of different teaching methodologies, and improvement of the level of students’ satisfaction.

The faculty members recommended more focus on the concept of professionalism. This agrees with Al-Eraky et al. (2015) who recommended including educational professionalism in FDPs. It is crucial to invest the clinical experience and skills in enhancing educational skills. In (2005), Bligh reported that the establishment of an FDP was expected to improve teaching skills for the medical staff, change how they viewed the student-teacher relationship, and teach them novel teaching methods, innovative ways of designing curricula, and acquisition of desired experience in student assessment (Bligh, 2005).

This study revealed the importance of IPE between the faculty members. The Centre for the Advancement of Interprofessional Education (CAIPE) defined IPE as the collaborative learning of two or more professionals to cultivate work cooperation in addition to the quality of care. Prequalifying IPE can provide chances to explore how professionals can work more cooperatively to respond more effectively and economically to different needs while raising students’ appreciation of professional and good practice. The rationale for the community of practice and group learning can reinforce mutual awareness, trust, and respect, antagonizing ignorance, preconceptions, and undesired competition. Interdependence in practice may result from interdependence in learning (Barr et al., 2017).

The current work tested the FDP’s coverage of leadership and management topics, with results reaching around 77.5% of exceeding or meeting the faculty's expectation. This reflects the extreme importance of the development of leadership and management attributes for health professional educators. Bergquist and Phillips (1975) stated that acquiring leadership skills and teamwork attitudes is an important requirement for organizational development.

The faculty recommended focusing on interactive, workshop-style sessions. This agrees with Reid et al. (1997) who reviewed several studies published between 1980 and 1996 and concluded that faculty development seminars, workshops, and fellowships lead to very good results.

The respondents in this study suggested that the college administration should invite medical education experts for FDP sessions. This concurs with surveys performed in the Universities of McGill, Montréal, Alberta, and the University of British Columbia, where 85% of the participants agreed with providing medical education training of the clinicians. The participants in this study suggested the FDP be held once per month. This is counter to the aforementioned surveys in which over 40% of respondents indicated that training program sessions to be held for at least one half-day per week (Sherbino et al., 2014).

The current work raised the idea that FDPs should focus on raising the capabilities of the faculty members in the field of research and publication. This agrees with a survey of U.S. and Canadian medical schools on academic promotion criteria, reported by Beasley and colleagues in 1997, in which around 80% considered research and publication skills very important and should be among the main clinician capabilities (Beasley et al., 1997).

Teamwork and IPE were amongst the important suggestions by the respondents of this study. The link between teamwork and enhanced performance and improvement of productivity has been established in many public and private work settings (Hackman, 2002, Wheelan et al., 1998 and Wheelan and Tilin, 1999).

This study recommends further research through the advanced levels of the Kirkpatrick model for program outcome evaluation.
Conclusion

FDP is very important in the improvement of the knowledge and skills of faculties in learning, teaching, student assessment, leadership and management, research, and publication. The recommendations raised by the faculty in this study will be used for the improvement of the current FDP by dividing the program into themes for the above-mentioned topics.

Take Home Messages

- FDP should be considered a milestone in novel ambitious medical schools. It is tremendously accepted nowadays between faculty as an important tool to improve their knowledge, interprofessional education, leadership and management skills, teaching capabilities, student assessment in addition to research and publication practices.

- It is recommended to be mainly as workshops, once or twice per month, with the invitation of expert speakers in the medical education field.

- To enhance the efficacy of the FDP, the faculty suggested sharing in preparation and presentation of different topics by all faculty members and to focus mainly on the college needs.

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**Appendices**

None.

**Declarations**

*The author has declared that there are no conflicts of interest.*

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**Ethics Statement**

The ethical committee of the College of Medicine – University of Bisha has approved the study with reference number [UBCOM/ H-06-BH-087 (04/21)]. An agreement of the faculty to be enrolled was considered as informed consent.

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