

## Evaluation of Management of Department of Endodontics, Faculty of Dentistry, Tehran University of Medical Sciences

### FERESHTEH FARZIANPOUR

Associate professor, Dept. of Health Management & Economics,  
School of Public Health, Tehran University of Medical Sciences, Iran.

Email: [farzianp@sina.tums.ac.ir](mailto:farzianp@sina.tums.ac.ir)

### MOHAMMAD ZARABIAN

Associate professor, Dept. of Endodontic, Faculty of Dentistry,  
Tehran University of Medical Sciences, Iran.

### MOHAMMAD REZA SHARIFIAN

Associate professor, Dept. of Endodontic, Faculty of Dentistry,  
Tehran University of Medical Sciences, Iran.

---

#### *Abstract*

*In this study Endodontics group benefiting from opinion poll of university lecturers, student and graduates have evaluated their system of educational and their aim was to remodel and adjust educational system with the society's needs and promotion of the quality of such educations. The employed method was cross sectional and descriptive and analytical on the basis of 10 procedural steps and within 8 sections dealing with evaluated factors. Such as Scientific board members, management and organizational capability, students, manpower and logistic affairs, educational environments, research work centers, health and therapeutic sections, educational equipment, research equipment, laboratory and diagnosis centers, educational courses and programs, teaching and learning process as well as satisfaction expressed by students. The results of the research showed that general average of 8 investigating sections were %71.6 as a desirable research work. It is, therefore, concluded that function of the educational management is directly in line with evaluation process. Educational evaluation is the best indicator showing how much we should go to achieve certain aims, analyzes quality of the activity if such a system and by which we achieve logical and routine results.*

**Key Words:** *Internal Evaluation, Department of Endodontics, Faculty of Dentistry; Tehran University of Medical Sciences.*

---

#### **Introduction**

Educational evaluation is the best indicator to the level of educational objectives achievement and it deals with analyze of educational activities in university system. And from that it is possible to reach rational and well-known results (Farzianpour et al, 2013a).

Tehran University of Medical Sciences and Health Services, Iran, is considered as one of the most important, educational, health care and research institute in society for problems solutions and for training specialist and efficient forces (Farzianpour et al, 2011a).

It is expected that this educational institute will define a method for solving social intricate issues and for development of the science by training potential learner's abilities (Farzianpour et al, 2010a), to meet expectations of the society, it is necessary to define objective and appropriate planning in order to reach

these results, Planning in the university begins with understanding the needs. It leads to evaluate or process of compiling required data in order to judge a bout decision making issues in educational system for increasing quality level (Farzianpour et al, 2011b).

On the other hand, world is changing so rapidly and continually, that it is to be considered as a necessity to review educational programs continually for new expectations (Farzianpour et al, 2013b). Appropriate evaluation and research in education are considered as practical tools for confirming to these changes in order to promote research, health care and educational quality levels (Farzianpour et al, 2009).

In this way, the success key and reaching the required, quality level in this university are training scientific board members and encourage them to participate in activities, evaluation of group activities solving of problems and making standard educational elements and tools (Farzianpour et al, 2010b).

To this, in 2000, Study and Educational Development Center in Tehran University of Medical Sciences decided to perform an internal evaluation plan for Endodontics group in faculty of Dentistry. This plan was about their situation and existed abilities so they could identify strengths and weaknesses in order to compensate the shortages. Consequently they could declare their preparation to perform internal evaluation annually as well as external periodic evaluation, on the basis of compiled indicators and functional basis and eventually accreditation, validity measurements and validity recognizing at university level (Farzianpour et al, 2014a).

## Materials and Methods

In this study, educational group of Endodontics group in faculty of Dentistry was evaluated using some questionnaires to scientific board members and students in order to conformity education to society needs and increasing quality level.

This study was cross sectional and survey descriptive and analytical evaluation questionnaires were some tools for collecting data which included collected statements and closed and opened type choices and multiple choice.

All statements of questionnaires were developed and standardized for validity and reliability based on the latest resources and educational evaluation sources. The educational evaluation was performed based on the following 10 steps and in 8 areas: 10 Steps in evaluation of educational management:

- Step1: To acquaint scientific board members about evaluation educational management Process.
- Step2: To envelop committees on evaluation in educational and remedial courses and explain about it to members.
- Step3: To compile objectives (educational remedial and research objectives)
- Step4: To define evaluation factors and related criterion.
- Step5: To define and compile appropriate indicators for evaluation of factors.
- Step6: To specify the required data for judging about each one of the factors.
- Step7: To select and compile-needed tolls for collecting data.
- Step8: To collect data
- Step9: To analyze data, discussion and making conclusion.
- Step10: To prepare a report and represent suggestion

## The Areas Under Study were as follows:

- 1- Organization and management
- 2- Scientific Board
- 3- Learners

- 4- Human resources and support
- 5- Remedial hygienic research and educational spaces
- 6- Diagnosis laboratories, research and educational equipment
- 7- Educational programs and courses and learning – Teaching Process.
- 8- Satisfaction of the graduates

### Validity of Data Collecting Tools

A table was developed before preparation data collecting tools, which exactly specified each one of the related research questions and on that basis, the tools were provided. Then to define appropriate validity of data collecting tools, experts reviewed compiled questionnaires; next questions were clarified including direct questions and uncertainties. The main requirement to questionnaire validity was providing correct questionnaires with expressions whose uncertainties were minimized as much as possible. The content validity matter was that question sample scientific important aspect of the objective at research or not.

In order to obtain scientific validity for questionnaires, content validity method was used. The questions were provided through text study and present research collections . In concern to stability in data collecting tools about question was defined and clarified.

### Data Analysis Method

Data description, abundant collections, preparing abundant tables, percentages,  $X^2$ , regressions and variance analysis were used as follows:

- 1- Fax program was used for inputting data to computer and editing them.
- 2- All data were analyzed using software SPSS 9, 10 and descriptive and statistically method such and absolute abundant, calculation and geometrical average and percentage,  $x^2$  and statistical regression assessment.
- 3- For providing and designing graphs software HG-3 was used.
- 4- Data resulted from research was quantified by appropriate calculation formulations and then compared with each other. The resulted calculations were recorded in related tables to represent information. In order to compare data in each case ANOVA Test and  $x^2$  method were used.
- 5- On the basis of SWOTs pattern educational evaluation results in 15 groups on basic and clinical sciences were studied.
- 6- Software SPSS and Excel were used to convert qualitative data to quantitative data.

To identify strengths and weaknesses in areas under study which were as follows, the survey range in all educational groups was used:

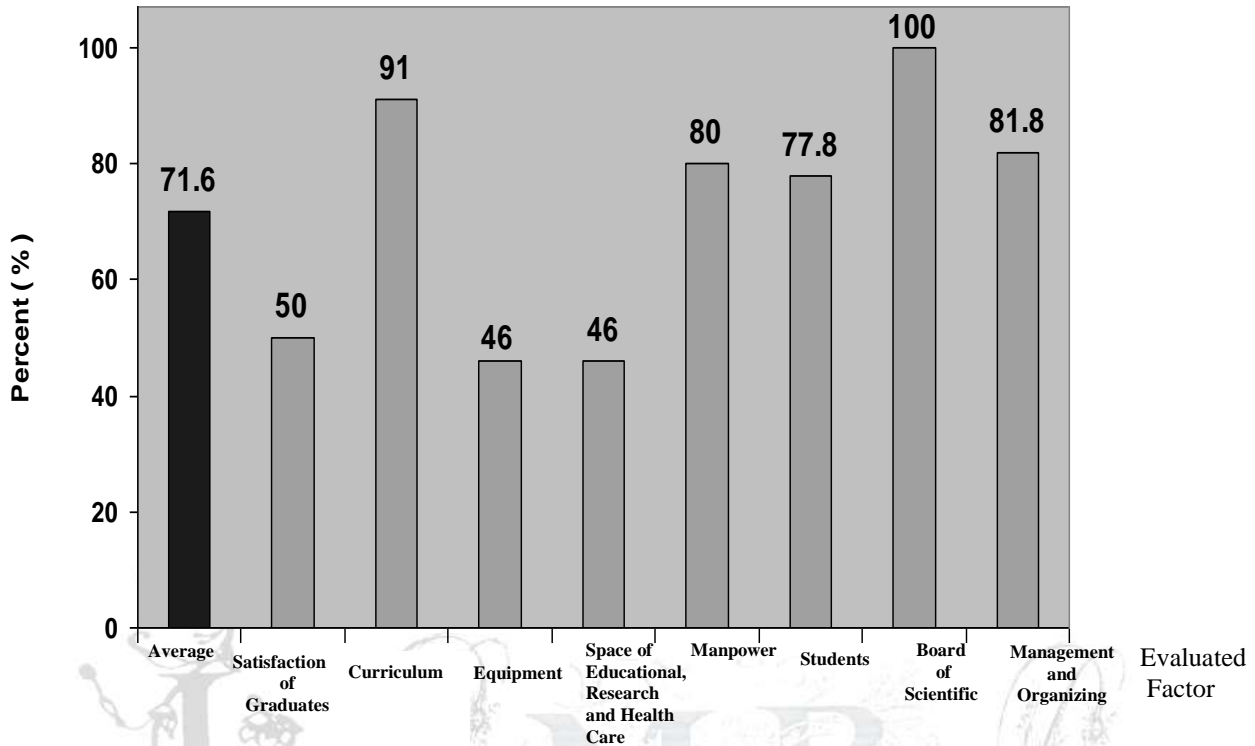
Data results less than %50 was undesirable; Data results between %50-%75 were relatively desirable; Data results more than %75 is desirable.

### Results

As Shown in Box 1,2 educational evaluation council on educational group of Endodontics was developed educational strategies based on special objectives and educational indicators based on criteria.

Average results from educational evaluation at educational group were represented at (Fig 1). Strengths and weaknesses, opportunities and threats educational were analyzed on the basis of SWOTs pattern at the educational group (Box 3).

Fig 1: Result of internal evaluation in Dept. of Endodontics, faculty of Dentistry, Tehran University of Medical Sciences



Box1: Educational strategies based on special objectives

Special objectives	Educational strategies
1- Improving and promotion of quality level and remedial hygienic research and educational program development conforming to society needs at university level.	1- Internal evaluation about educational programs quality
2- Increasing the number of scientific board members and specialists in educational groups.	2- Present permanent system reviews in order to performance of desirable internal evaluation.
3- Knowledge development and achieving modern technologies.	3- Developing scientific relations with other universities and domestic and foreign authorized centers.
4- Training efficient human resources at remedial hygienic research and educational courses.	4- Promotion of short time educational courses qualitatively.
5- Promotion of scientific board members, facilities, equipment conditions and educational resources in laboratories and so on in this purpose, strategies were developed for above mentioned special objectives.	5- Promotion of remedial – hygienic research and educational materials and conditions qualitatively.

Box 2: Indicators Based on Criteria

Criteria	Indicators
Management	Management organizational structure, remedial research, service and educational Performance function description, internal and external activities of members planning, management authorities.
Scientific board	Scientific board distribution, operational, remedial, hygienic research and educational activity information and experience.
Learners	Educational improving.
Learning teaching Process	Applying educational technology by scientific board, educational improving, teaching methods and graduates.
Educational courses and curriculum	Educational courses quality, conforming courses to objectives, group courses content, conforming courses to mission, objectives, facilities and program evaluation.
Graduates	Capability, identification, relation between learners and their educational group after completing education, occupational future (destination) keeping education, management and planning service receivers' comments about learners occupation capabilities.
Equipment	Service remedial hygienic research and educational resources. Space, facilities, laboratory, library, computer, visual and audio Radiology, clinic, office and pavilion and...
Research	Research activities, study opportunities research programs compiling, group, gathering, text magazine research plans...
Satisfaction	Management, scientific board and learners satisfaction with all educational operational remedial hygienic and research aspects.

Box 3: SWOTs at Educational Group

<p><b>Opportunity</b> Health Care, research and Educational validity of university</p>	<p><b>Strength</b> Scientific board members, experienced and powerful experts, Students, manpower, curriculum development</p>
<p><b>Threats</b> Powerful Scientific board retirement</p>	<p><b>Weakness</b> Scientific board welfare, modern Technology for units, spaces of educational, research and health care equipment, satisfaction of graduates</p>

## Discussion

Educational evaluation is an essential and inseparable component of any organizational functions particularly the organizations such as medical education, remedy and hygiene which is Para medicine coordinator planner and operator as well as variable ranger of remedial and hygienic services in the country (Farzianpour et al, 2014b). It is a process, which deals with collecting data and judging about educational activity promotion . Given some principles related to educational measurement and data collecting it could be well understand (Farzianpour et al, 2014c).

The results of the research showed that general average of 8 investigating sections were %71.6 as a desirable research work. Therefore, concluded that function of the educational management in that group was directly in line with evaluation process.

Previous studies in educational evaluation showed average of the function of educational evaluation in basic sciences groups and clinical groups were respectively 76.4% and 86.6% while grand average of the function of clinical groups and basic sciences groups was 80.5%.

In university educational system, it is possible to use educational evaluation in electing students, scientific board, and curriculum and in general the other educational system inputs in addition, it supervises on system process performing and finally using evaluation directs outputs and system consequences optimally (Farzianpour et al, 2014d).

In the most developing countries the number students has increased and per head budget of university education has decreased it is expected that higher education system will operate more against decreased resources (Farzianpour et al, 2012).

This decreased in financial resources has affected on research and educational quality. So it is necessary to regard a kind of standard to higher education quality (Farzianpour et al, 2013c). So it is necessary that medical education system structure in our country meets some educational quality and is changed due to existed shortages in educational programs and for meeting society needs (Farzianpour et al, 2010c). One of the methods, which can be helpful in identifying strengths and weaknesses in an educational system, is educational evaluation (Farzianpour et al, 2011d).

Occupational capabilities and graduates efficiency in medical sciences fields depend on the level of achieving objectives in educational programs in order to present remedial, hygienic services, research and educational programs, for promotion of individual and society health level (Farzianpour et al, 2013c). And if educational programs haven't developed and performed correctly, it can cause irreparable damages and economic, cultural and social serious effects on individual and graduates as well as university management and the validity.

On the other hand given government wide investment on human resources, financial. And physical sources to develop medical education centers it seems necessary to evaluate different aspects of educational programs in medical groups. So it is necessary to equip the management with control and supervision tools according to educational programs. If educational management has an effective and helpful system for evaluation then it will have an active and dynamic nature.

On the other hand, identifying and analyzing problems and issues in educational system can be considered an important step to improve university educational system and consequently being ready to perform remedial, hygienic and medical development programs in the country.

### Suggestion

1. Development educational, research, Spaces of educational, Research and Health care in Endodontics group.
2. Modern technology for units.
3. Scientific board welfare.

### Acknowledgement

The authors are grateful to Scientific Boards and others members of Endodontics Department, Tehran university of Medical Sciences, Iran, for their helpful assistance.

### References

Farzianpour,F, Hosseini, SH, Mirsepasi, AB, Honary,H , Hosseini,SSH andHosseini,S.,(2013a). Internal evaluation of the department environment Al health science and engineering. American Journal of Applied Sciences, 10 (1): 58-63, 2013 ISSN: 1546-9239 ©2013 Science Publication doi:10.3844/ajassp.2013.58.63

- Farzianpour, F., H. Dargahi, S. Hosseini, S.S. Hosseini and S. Hosseini.,( 2011a). Program evaluation of health care management: Is it adjusted for students needs? *Am. J. Econ. Bus. Admin.*, 3: 420-424. [10.3844/ajebasp.2011.420.424](https://doi.org/10.3844/ajebasp.2011.420.424)
- Farzianpour, F., A.H. Emami, F. Davari-Tanha, S. Hosseini and A.R. Farzanehnejad.,( 2010a). Educational programs' quality assessment based on graduates' comments. *Iranian Red Crescent Med. J.*,12: 302-307.
- Farzianpour, F., S. Aghababa, B. Delgoshaei and M. Haghgoo.,( 2011b). Performance evaluation a teaching hospital affiliated to Tehran university of medical sciences based on baldrige excellence model. *Am. J. Econ. Bus. Admin.*, 3: 272-276. DOI: [10.3844/ajebasp.2011.272-276](https://doi.org/10.3844/ajebasp.2011.272-276)
- Farzianpour F, Hosseini SM, Hosseini SSH, Movahed Kor E, Amerzadeh M., (2013b). The relationship between nursing managers' self-reliance and patients, satisfaction in hospitals affiliated to Tehran University of Medical Sciences (TUMS). *Payavars salamat J.* 6(5):330-341. (Persian) <http://journals.ac.ir/abc/22933>
- Farzianpour, F., A.H. Emami and M.R. Eshraghian., (2009). The satisfaction of medical practitioners from continuing medical education program of Tehran University of Medical Sciences. *Iranian Red Crescent Med. J.*, 11: 371-376.
- Farzianpour, F., H. Dargahi, N. Eynolahi and S. Aghababa.,( 2010b). Internal evaluation in department of health care management in faculty of allied medical sciences Tehran University of Medical Sciences. *Health Inform. Manage.*, 7: 353-360.
- Farzianpour,F, Hosseini,SH, Salmani Arani,S, Bakhtiari,AH.,(2014a). Evaluation of international standards of patient and family rights(PFR) from chief nurses' point of view in hospitals of Iran. *Pensee Journal Vol 76, No. 6; Jun: 372-382*
- Farzianpour,F, Alirezaei,S, Rahimi Foroushani,A, kalantari,E.,(2014b). Evaluation of Care of Patient (COP) standards in selected hospitals of Tehran University of Medical Sciences. *Pensee Journal Vol 76, No. 3; Mar: 179-186*
- Farzianpour, F, kalantari, E, Rahimi Foroushani,A, Alirezaei,S.,(2014c). Assessment of Patient (AOP) standards in Teaching hospitals in Iran. *Pen see Journal Vol 76, No. 5; May: 119-124*
- Farzianpour, F, Hosseini, SH, Mortezagholi,S, Bamdad Mehrbany,K(2014d). Accreditation of Patient Family Education (PFE) in theTeaching Hospitals of Tehran University of Medical Sciences from the Nurses view. *Pens see Journal Vol 76, No. 6; Jun: 182-193*
- Farzianpour F, Rahimi Fouroshani A, Beyzaiee S, Hosseini S., (2012). Evaluation of the Self-Esteem Managers in Clinical Wards of Hospitals Affiliated to Tehran University of Medical Sciences. *World Appl. Sci. J.* 16(5):686-692.
- Farzianpour F, Rahimi Fouroshani A, Kamjoo H and Hosseini SSH., (2011 c). Organizational Citizenship Behavior (OCB) Among the Managers of Teaching Hospitals. *Am. J. Econ. Bus. Admin.* 3(3):534-542, DOI:[10.3844/ajebasp.2011.534.542](https://doi.org/10.3844/ajebasp.2011.534.542).
- Farzianpour F, Emami AH, Davari-Tanha F, Hosseini S, Farzanehnejad AR.,(2010c). Educational Programs' Quality Assessment Based on Graduates' Comments. *IRCMJ 2010; 12(3):302-307* ©Iranian Red Crescent Medical Journal
- Farzianpour, F ,Roholah Askari, R, Torabipoor Hamedani,A, Khorshidi,GH, Amirifar,S, and Hosseini, SH.,(2011d) . Accreditation of Emergency Department at a TeachingHospital in Tehran University of Medical Sciences in 2010. *American Journal of Economics and Business Administration* 3 (3): 498-505, 2011ISSN 1945-5488© 2011 Science Publications
- F Farzianpour, F, Geray, S, Rahimi Foroushan, A, Arab, M, Hosseini, SH.,(2013c). Evaluating the average access to care and continuity of care patients in Tehran teaching hospitals. *Health* 5 (2013): 2110-2115. <http://dx.doi.org/10.4236/health.2013.512288>