# **Original Article**

# Improving mentor-mentee relationships in the medical profession: analysis of responses from physicians

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# **Abstract**

**Background:** Mentorship is the act and process of transmitting appropriate skills, attitude and character from a more knowledgeable and experienced person (mentor) to a less experienced person (Mentee) in a given field of endeavour or profession.

**Aim**: To analyze responses from physicians on ways of improving mentorship in the medical profession.

**Methods**: A prospective analytical study of responses from physicians at various level of training across several fields of the medical profession carried out in June 2021 amongst physicians in Port Harcourt. Data obtained through an electronically generated semi-structured questionnaire on mentorship were analyzed descriptively using the Statistical Package for Social Sciences (SPSS) version 21.

Results: One hundred and sixty-two medical doctors participated in the study comprising 67 (41.4%) males and 95 (58.6%) females giving a male to female ratio of 1: 1.4. The predominant age group was 31-40 years (40.1%). Forty-seven (29%) have practiced medicine for between 11-15 years. One hundred and thirty-seven (84.6%) doctors practiced in public hospitals. Majority of the doctors were consultants. Only 42 (25.9%) of the medical trainers and trainees have ever been involved in formal (structured) mentoring. Majority had been involved in informal mentorship. The areas of interest for mentorship identified by the doctors include the practice of medicine/surgery/dentistry, leadership in health organization, research, teaching/medical education, medical business amongst others. Effective mentorship requires that mentors should clarify mentees on what their roles should be (61.7%), discuss possible solutions to difficult issues (49.4%) and help mentees identify their strengths and weaknesses (58.0%).

**Conclusion:** Mentor-mentee relationships can be improved among medical practitioners.

**Keywords:** Mentor, mentee, relationship, improvement, medical profession

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#### INTRODUCTION

Mentorship is the act and process of transmitting appropriate skills, attitude and character from a more knowledgeable and experienced person (mentor) to a less experienced person (mentee) in a given field of endeavor or profession.1 It provides an intricate relationship between two persons (mentor/mentee) usually at different levels of professional experience and expertise for mutual gains.<sup>2</sup> The strength of the mentormentee relationship determines the effectiveness of the mentorship process and the extent of such mutual gains.

The medical practice is structured to be nurtured by mentorship. All phases of medical education, residency (post-graduate) training, career advancement and administrative capacity building are rooted to flourish on mentorship.

A good mentorship relationship therefore can significantly improve the quality and delivery of clinical skills, promote responsible conduct of research as well as improve ethical behaviour among medical trainees.3 Manthiram and Edwards<sup>1</sup> have noted that a good mentor-mentee relationship has been an enriching source of motivation, knowledge, and self-reflection along the challenging but fulfilling journey of a career in science and medicine. They also opined that mentors should show willingness to teach, commitment to the relationship and have a mechanism for receiving feedback from mentees to build a strong mentor-mentee relationship.

This relationship sometimes translates into a life-long one, evolving at various stages of the professional growth ladder. Hazzard<sup>4</sup> in his work on "Mentoring across the Professional Lifespan in Academic Geriatrics," opined that mentoring relationship never ends, with senior faculty being mentored by division heads, deans, and leaders in the field. With the right set of ingredients therefore, the mentor-mentee relationship can deliver lasting benefits not only to the parties involved, but more importantly to the future of the profession.

Appropriate efforts must be made to consistently improve on the relationship and review the changing demands, expectations and commitments from both parties. This study aims to analyse the responses from physicians on ways of improving the mentorship relationship.

#### METHODOLOGY

# Study design

This was a prospective analytical study done in June 2021. The study was a descriptive analysis of responses from physicians at various level of training across several fields of the medical profession and involved 162 physicians across various fields of medicine. The study tool, which was an electronically generated questionnaire, was distributed to respondents who willingly participated in the study. The respondents were mostly registered participants of a mentorship webinar organized by the local medical association with the aim of enlightening physicians on the benefits of mentorship.

# Study location

This study was carried out among physicians in Port Harcourt, the capital of Rivers State, Nigeria. Port Harcourt is located in the southern part of Nigeria with a population of 5,522,575 based on 2006 National Population Census figures.<sup>5</sup>

#### Study tool

The study tool was an electronically generated semi-structured questionnaire on mentorship. The tool had several sections addressing mentees expectations, mentors level of training and close-ended suggestions on how to improve the relationship between mentor and mentee. Content validation was done by the authors.

# Study details

Semi structured electronically generated questionnaires containing relevant variables on mentorship were randomly distributed among medical doctors practicing in Port Harcourt who gave consent to participate in the study.

The participants voluntarily gave consent, filled the questionnaires electronically and submitted by same route. Data collated were analyzed using the Statistical Package for Social Sciences (SPSS) version 21(IBM Corp., Armonk, NY, USA). Tables and bar charts were used to present the results. They were expressed as proportions, means and standard deviations.

# **Ethical approval**

The authors obtained ethical approval before commencement of the study. Consent was also voluntarily given by all respondents.

# Data analysis

Data obtained was analyzed descriptively using the Statistical Package for Social Sciences (SPSS) version 21 (IBM Corp., Armonk, NY, USA). Results were presented in tables and charts where necessary. Means and standard deviations were used to represent socio-demographic characteristics of respondents. Chi-square test was used where appropriate and p-value of <0.05 was deemed statistically significant.

#### **RESULTS**

One hundred and sixty-two medical doctors participated in the study. Sixty-seven (41.4%) were males, while 95 (58.6%) were females giving a male to female ratio of 1: 1.4. The predominant age group was 31-40 years (40.1%), while the least represented group are doctors aged 70 years and above (1.9%). Forty-seven (29%) have practiced medicine between 11-15 years, while 3 (1.9%) of the respondents have practiced for 26-30years. One hundred and thirty-seven (84.6%) doctors, who participated in the study practiced in public hospitals, while 25 (15.4%) were in the private sector. These are shown in Table 1.

# Rank profile of participants

Majority of the doctors who participated in the study were consultants [49 (30.2%)], while the

Table 1: Socio-demographic characteristics of doctors interested in mentorship

Variables (N = 162)	Frequency	Percentage
Age category		
≤30 years	31	19.1
31-40 years	65	40.1
41 – 50 years	43	26.5
51 – 60 years	13	8.0
61 – 70 years	7	4.3
>70 years	3	1.9
Sex		
Male	67	41.4
Female	95	58.6
Years of practice		
0-5 years	42	25.9
6-10 years	30	18.5
11 – 15 years	47	29.0
16 – 20 years	12	7.4
21 – 25 years	9	5.6
26 - 30 years	3	1.9
31 - 35 years	10	6.2
>35 years	9	5.6
Institution		
Public	137	84.6
Private	25	15.4

least represented group was medical directors of private hospitals as shown in Figure 1.

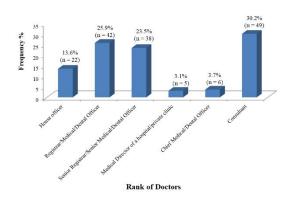


Figure 1: Rank of doctors interested in mentorship

# Participation in mentorship

Only 42 (25.9%) of the medical trainers and trainees have ever been involved in formal (structured) mentoring (Table 2). However, majority [118 (72.8%)] had been involved in informal mentorship. One hundred and eight doctors (66.7%) have been mentors at one point or the other, whereas 54 (33.3%) had not. One hundred and twelve (69.1%) have been mentees, while 50 (30.9%) had not.

Table 2: Awareness/participation of doctors in mentorship

Variables/Respons	Frequenc	Percentag
es	y	e
Been involved in a		
formal mentoring		
Yes	42	25.9
No	120	74.1
Been involved in		
informal		
mentoring		
Yes	118	72.8
No	44	27.2
Have you been a		
mentor to someone		
Yes	108	66.7
No	54	33.3
Have you been a		
mentee		
Yes	112	69.1
No	50	30.9

# Areas for mentorship

The areas of interest for mentorship identified by the doctors who took part in the study include the practice of medicine/surgery/dentistry, leadership in health organization, research, teaching/medical education, medical business, medical politics, national politics amongst others (Figure 2). Leadership in health organization [103 (63.6%)] was the predominant area of interest, while intra-professional well-being [1 (0.6%)] was the least.

Table 3: Summary score on areas that require mentorship among doctors

Variables	Mean ± SD	Median (range)
Leadership in health organization	9.02±1.97	10 (1 – 10)
Research	$9.14 \pm 1.98$	10 (1 – 10)
Medical business	9.07±1.82	10 (1 – 10)
The practice of medicine/dentistry/surgery	9.06±2.01	10 (1 – 10)
Teaching/medical education	8.69±2.31	10 (1 – 10)
Medical politics	8.54±2.10	9 (1 – 10)

SD – Standard deviation

#### Improving mentorship relationships

Table 4 outlined medical trainers and trainee's suggestions on how the mentorship relationship can be improved. One hundred (61.7%) agreed that that effective mentorship requires that mentors should clarify mentees on what their roles should be, while 1 (0.6%) disagreed. Eighty doctors (49.4%) agreed that effective mentors should discuss possible solutions to difficult issues, while 1 (0.6%) disagreed on this. Ninety-four (58.0%) agreed that effective mentors should help mentees identify their strengths and weaknesses, whereas 4 (2.5%) disagreed.

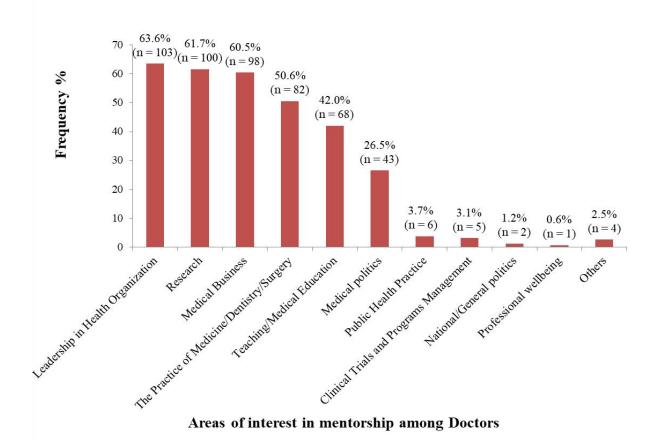


Figure 2: Areas of interest for mentorship as specified by doctors

Distribution of others include: Arts Medicine -1 (0.6%), Communication with policy maker -1 (0.6%), Management of disposable income -1 (0.6%), Successful combination of professional and social obligation -1 (0.6%).

The relevance of each of the above areas of interest was scored on a scale of 0 to 10 by the medical trainers and trainees who took part in the study. The result is as shown in Table 3.

# **DISCUSSION**

intricate and mutually benefitting relationship of mentorship needs consistent improvement to allow maximal benefit for both parties. This analysis shows that only 25% of 162 responders have been engaged in a formal mentorship program in the study area. This clearly shows the need for more education on the need for and benefits of formal mentorship in the pursuit of career goals in medicine. Neetles and Millett<sup>6</sup> had opined that doctoral students (mentees) in a mentoring relationship are more likely than those without a mentor to present papers at national conferences, publish articles while in school, and complete the program.<sup>6</sup> Johnson<sup>7</sup> further stated that such mentees are not only more satisfied with their careers but are also

more likely to be mentors themselves. Seventy-two percent (n=118) in our study have however been involved in informal mentorship relationships. Such form of mentorship is unregulated, unstructured and without organizational input. It is close to forming a bond with a kindred spirit but without clear goals and intents.<sup>3</sup>

Most respondents in this study were interested in leadership in health, health research and medical business as core areas of mentorship, with only 3.1% showing interest in clinical trials and health programme management. This poor interest in clinical trials among the respondents in the study population is a reflection of the poor output of clinical trials among practitioners in the area and raises

Neutral Agree

Strongly agree

13

82

65

8.0

50.6

40.1

serious concerns on the need to grow local evidence for effective clinical practice.

Table 4: Distribution of responses on improving mentorship relationships

improving mentorship relationships		Help mentees see problems from			
Variables/Responses	Frequency	Percentage	different perspective		
Clarify mentees' understanding of	1 ,	8	Strongly disagree Disagree Neutral	1 0 5	0.6 0.0 3.1
what their role entails			Agree	92	56.8
Strongly disagree	1	0.6	Strongly agree	64	39.5
Disagree	1	0.6	Ask mentees difficult		
Neutral	9	5.6	questions		
Agree	100	61.7	Strongly disagree	0	0.0
Strongly agree	51	31.5	Disagree	0	0.0
Discuss possible solutions to difficult issues			Neutral Agree Strongly agree	4 77 81	2.5 47.5 50.0
Strongly disagree	0	0.0	Con by Americal and As		
Disagree	1	0.6	Can be trusted not to disclose information		
Neutral	0	0.0	about mentees		
Agree	80	49.4	Strongly disagree	1	0.6
Strongly agree	81	50.0	Disagree	0	0.0
<b>Identify opportunities</b>			Neutral	7	4.3
for mentees			Agree	83	51.2 43.8
Strongly disagree	0	0.0	Strongly agree	71	43.8
Disagree	1	0.6	Help mentees identify		
Neutral	3	1.9	their strengths and		
Agree	82	50.6	weaknesses	1	0.6
Strongly agree	76	46.9	Strongly disagree Disagree	1 4	0.6 2.5
Let mentees know			Neutral	26	16.0
how they are performing relative to others			Agree Strongly agree	94 37	58.0 22.8
Strongly disagree	1	0.6			
Disagree	8	4.9	Provide a space to		
Neutral	16	9.9	talk in confidence Strongly disagree	3	1.9
Agree	94	58.0			
Strongly agree	43	26.5	Disagree	6	3.7
Share stories from their own experience			Neutral	47	29.0
Strongly disagree	0	0.0	Agree	60	37.0
Disagree	0	0.0	Strongly agree	46	28.4
Neutral	7	4.3			
Agree	71	43.8	Suggest how mentees		
Strongly agree	84	51.9	should act in certain		
Help reduce risks that may threaten			situations Strongly disagree	1	0.6
mentees' reputation	0	0.0	Disagree	2	1.2
Strongly disagree Disagree	0 2	0.0 1.2			
Disagree	<i>L</i>	1.4			

Neutral	23	14.2		
Agree	89	54.9		
Strongly agree	47	29.0		
Become friends with mentees Strongly disagree	2	1.2		
Disagree	5	3.1		
Neutral	27	16.7		
Agree	83	51.2		
Strongly agree	45	27.8		
If necessary intervene on mentee's behalf				
Strongly disagree	0	0.0		
Disagree	0	0.0		
Neutral	5	3.1		
Agree	59	36.4		
Strongly agree	98	60.5		
Shield mentees from potentially harmful situation or people				
Strongly disagree	21	13.0		
Disagree	46	28.4		
Neutral	60	37.0		
Agree	25	15.4		
Strongly agree	10	6.2		

On improving the relationship between mentors and mentees, the most common suggestions from most respondents were that mentors should clarify mentees on what their roles should be (61.7%, n=100), should discuss possible solutions to difficult issues (49.4%, n= 80), and should help mentees identify their strengths and weakness (58.0%, n=94). Holmes *et al.*<sup>8</sup> in their work on effective mentoring in the current era clearly stated five essential attributes of modern-day effective mentors which sums up the needed ingredients in improving the mentorship

relationship from the point of view of mentors. These attributes include: knowledge, credibility, communication, altruism, and commitment. They further stated that effective mentors should have requisite knowledge and skill in their chosen fields, stand clearly above the mentees in demonstrating these, open up effective communication channels that will benefit the mentees, show selflessness and commitment to the mentorship relationship.

Cho et al. 9also stated that a good mentorship relationship between mentees and outstanding mentors should have the following attributes on the side of the mentors: demonstration of good personal qualities, including enthusiasm, compassion, and selflessness. They further reported that good mentors should in addition, "act as a career guide, offering a vision but purposefully tailoring support to each mentee; make strong time commitments with regular, frequent, and high-quality meetings; support personal/professional balance; and leave a legacy of how to be a good mentor through role modeling and instituting policies that set expectations and standards mentorship".

More than 80 % of respondents in this study also agreed that the mentorship relationship will thrive better if mentors identify opportunities for mentees, let mentees know how they are performing relative to others, help mentees identify their strengths and weaknesses, share stories from their own experience as well as help mentees see problems from different perspective

This study had a number of limitations. The respondents were mostly registered participants of a mentorship webinar organized by the local medical association with the aim of enlightening physicians on the benefits of mentorship. A wider scope may perhaps produce more elaborate findings.

#### **CONCLUSION**

Mentor-mentee relationships can be improved among medical practitioners. The findings from this study can provide the needed framework for the setting up of a training program for prospective mentors with the view of initiating an intuition-based formal mentorship program for physicians within the sub-region.

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#### **Conflicts of interest**

There are no conflicts of interest

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