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# Students' and examiners' perception of feedback practices following OSCE in Uniport

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#### **Abstract**

The Objective Structured Clinical Examination (OSCE) offers several opportunities for effective feedback to be given to students to improve their performance. This study aimed to evaluate the feedback practices following OSCE in the University of Port Harcourt (Uniport). This was descriptive research involving the administration of semi-structured questionnaires to examiners in the Faculty of Clinical Sciences and final year medical students in Uniport. Information sought centred on their perception of feedback practices following OSCE. Data was analysed using descriptive statistics and Chi-square. The result showed that 114 examiners participated in the study. There were 72 (63.16%) male and 42 (36.84%) female examiners with male to female ratio of 1.7:1. Ninety students participated in the study. There were 49 (54.44%) males and 41 (45.56%) females. Their mean age was 25.42±2.36. There were significant differences between the examiners and students perception of feedback practices following OSCE in Uniport in terms of whether (P=0.009) and when (P=0.0014) it is provided. Majority of the examiners (58.49%) and almost all the students (91.49%) reported that feedback resulted in improved performance. The stud v showed that about half of the students claimed that feedback is given following OSCE in Uniport. Feedback practice following OSCE in Uniport is satisfactory in some aspects and deficient in some other aspects. Incorporate quality feedback practices into the OSCE process in all medical schools will improve skills development and learning.

Keywords: Examiners, Feedback, Medical, Objective structured clinical examination, Students.

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# Contribution of this paper to the literature

Previous studies in Nigeria have focused on assessing medical students' perception of the OSCE, very few have focused on examiners' and students perception of feedback practices following OSCE in medical schools in Nigeria.

### 1. Introduction

Clinical examination assesses the students' competence to practice medicine and is considered to be a very important aspect of qualifying examinations in medical schools (Harden & Gleeson, 1979). The Objective Structured Clinical Examination (OSCE) has been validated worldwide as the best approach for the clinical examination because it is based on performance and allows for the standardized assessment of the clinical skills of the medical students (Medical Council of Canada, 2014). Because of its objectivity, OSCE is considered to be superior to the traditional assessment method in medicine.

The strength of OSCE lies in the fact that clinical skills are directly observed by the clinical examiners, a broad range of skills are assessed in a specified length of time, unbiased assessment based on standardized approach and prejudice is eliminated through the use of multiple examiners (Medical Council of Canada, 2014). Another major advantage of OSCE is that it provides a rare opportunity for the provision of feedback to students which will help sharpen their clinical skills and improve learning. Van De Ridder, Stokking, McGaghie, and Ten Cate (2008) defined feedback as "specific information about the comparison between a trainee's observed performance and a standard, given with the intent to improve the trainee's performance". Their definition show that the purpose of feedback in medical education is not just to inform students about the difference between expected learning goals and their observed performance but to also show them how to bridge the gap.

One unique benefit of OSCE is that it offers chances for individualized feedback on clinical competence. For example during OSCE, students are made to mandatorily rotate through 7 to 10 stations designed to assess competence and examiners assess their performance objectively using a marking scheme (Ngim et al., 2021). This offers opportunities to provide individualized and timely feedback to help students improve their clinical skills. Peron et al. (2016) evaluated students' perception of the feedback they received after a formative OSCE and observed that the students reported that their history taking, physical exams and communication skills improved with the feedback they received from their tutors. However, the objective assessment showed some deficiencies in the content of the feedback the students received. It showed that the feedback content essentially focused on history taking and physical exam skills, completely ignoring clinical reasoning and communication/professionalism issues. Peron et al. (2016) concluded that the tutors involved in their study do give specific and descriptive feedback, but failed to actively involve the students in the learning process. They opined that actively involving the student in the feedback process will not only improve their performance in OSCE, but will also improve their professionalism and communication skills as well.

University of Port Harcourt (Uniport) has been organizing OSCE for undergraduate medical students for the past 7 years. Quality assurance in OSCEs demands that the examination process must be assessed with the intent of providing feedback to all the parties involved in the examinations. These parties may include students, examiners, standardized patients, question developers and administrators. The extent and frequency to which feedback is incorporated in to OSCE in Uniport has not been reported. This information is a basic requirement for ensuring quality assurance.

### 1.1. Aim and Objectives of the Study

The study aimed to evaluate the feedback practices following OSCE in the Faculty of Clinical Sciences, College of Health Sciences, Uniport.

Specific objectives include to:

- 1. Gather information on examiners and students perception of feedback practices after OSCE in the University.
- 2. Identify the perception of students about the impact of feedback or lack of it on their performance in OSCE.

### 1.2. Research Questions

- 1. How does the perception of students differ from that of examiners on feedback practices after OSCE in Uniport?
- 2. How does feedback or lack of it impact on students' performance.in OSCE?

### 2. Methodology

### 2.1. Research Design

Descriptive cross sectional study design.

# 2.2. Study Area

The study was conducted in the Faculty of Clinical Sciences, Uniport. The University is located in Port Harcourt Metropolis in Rivers State in Southern Nigeria.

# 2.3. Study Population

The study population included the clinical examiners in the Faculty of Clinical Sciences and the final year clinical students of the University.

### 2.4. Sampling and Sampling Technique

Sampling was not done in this study because the Census Method was used. There were 140 clinical examiners and 104 final year medical students giving a total figure of 244. Ten clinical examiners and ten final year medical students participated in the pilot test and were excluded from the study, leaving a population of 224.

### 2.5. Method Of Data Collection/Instrumentation

Self-administered, open and structured questionnaire was administered to all the students and lecturers who consented to participate in the study. Different questionnaires were given to the students and the lecturers. The questions were based on their experiences with OSCE. Their individual perception on feedback practices following OSCE was sought. Demographic information was also sought from the participants. The questionnaires were administered to the students in the classrooms, while the soft copy of the questionnaire was sent to the examiners through email and WhatsApp. Filled questionnaires were retrieved from the participants.

### 2.6. Method of Data Analysis

Data was fed into Microsoft Excel ® version 2010 where it was coded and cleaned. It was then analysed using "Statistical Package for Social Sciences (SPSS) v20" and summary statistics was generated. The association between two categorical variables was tested using Chi-square ( $c^e$ ) test analysis. P-value is set as  $\leq 0.05$  at a 95% confidence interval.

### 2.7. Ethical Approval

The Research Ethics Committee of the University of Port Harcourt gave approval for the study.

### 3. Results

One hundred and fourteen clinical examiners, 72 (63.16%) males and 42 (36.84%) females with male to female ratio of 1.7:1 participated in this study. Majority 92 (80.70%) of the examiners were 46 years and above in age and the mean years of being clinical examiner was 14.11±6.60 years. All the examiners had participated in OSCE before and the majority 54 (47.37%) had been participating in OSCE for 5 to 9 years.

Ninety final year medical students, 49 (54.44%) males and 41 (45.56%) females, with a male to female ratio of 1.20:1 participated in the study. The mean age of the students was  $25.42\pm2.36$  years. All the students (100%) had participated in OSCE and majority 88(97.78%) first participated in 500 grade level.

Table 1 shows the students' perception of OSCE in the University of Port Harcourt. Eighty-two (91.11%) students believed that the exams covered a wide area of knowledge, majority 86 (95.56%) agreed that the task they were asked to perform reflected what they were taught and 50 (55.56%) agreed that the time spent at each station was adequate. Seventy-nine (87.78%) students believed that the OSCE instructions were clear and 43 (47.78%) students disagreed that personality and social relationships affected the OSCE assessment scores.

Table 1. Students' perception of OSCE in the University of Port Harcourt.

Variables	Frequency (n=90)	Percentage (%)
Generally in your view, OSCEs co	vered a wide area of knowledge	
I agree	82	91.11
I disagree	2	2.22
I am not sure	6	6.67
Generally in your view, the task yo	ou were asked to perform, reflected what you	were taught
I agree	86	95.56
I disagree	26	28.89
I am not sure	2	2.22
Generally in your view, the time s	pent at each station was adequate	·
I agree	50	55.56
I disagree	26	28.89
I am not sure	14	15.56
Generally in your view, the OSCE	instructions were clear and unambiguous	·
I agree	79	87.78
I disagree	8	8.89
I am not sure	3	3.33
Generally in your view, personalit	y and social relationships affected OSCE asses	ssment scores
I agree	26	28.89
I disagree	43	47.78
I am not sure	21	23.33

 Table 2. Students' and examiners' definition of feedback.

Examiner's definition	Frequency (%)	Students' definition	Frequency (%)
A response given by the examiner to	96 (84.21)	Critical assessment/Response of a	41 (45.56)
the students after an exam		process or activity or of the result	
A post assessment communication	15 (13.16)	A message (Spoken or written	37 (37.78)
between examiner and candidate		review) from your examiner about	
aimed at improving teaching and		your performance in the OSCE to	
learning outcome		aid improvement	
No response	3 (2.63)	A form of correspondence,	5(5.56)
		communication or review	
		Assessment of my experience	4 (4.44)
		The last part of proper	2(2.22)
		communication	
		To know the effect of something at	2(2.22)
		its target	
		I don't know	2(2.22)

Table 2 shows the students' and examiners definitions of feedback. The definition given by majority 92(84.21%) of the examiners is that feedback is a response given by the examiner to the students after an exam. The definition

of feedback given by majority 41(45.56%) of the students is that feedback is a critical assessment response of a process or activity.

Eighty (70.18%) examiners agreed that feedback is always given after OSCE in their departments Table 3a. Out of these, 60 (50.42%) said that the feedback is given to the lecturers/examiners and 53 (44.54%) said that it is given to students and 6(5.04%) said it is given to standardized patients. Thirty-nine (48.75%) examiners agreed that the feedback provision is class based and 24 (30.00%) reported that it is sub-group based. Out of the 80 who said feedback is always given after OSCE, 51 (63.75%) believed that the feedback is given immediately or soon after the OSCE.

Table 3a. Examiners' perception of feedback practices following OSCE in Uniport.

Variables	Frequency	Percentages (%)
Is feedback given after OSCE in your department? (	(n=114)	-
Yes	80	70.18
No	34	29.82
If yes, to who? (n=119) (Multiple responses applicable)	)	
Lecturers/Examiners	60	50.42
Students	53	44.54
Standardized patients	6	5.04
If yes, is the feedback provision (n=80)		
Class based	39	48.75
Sub-group based	24	30.00
Individualized	15	18.75
No response	2	2.50
When is the feedback given?		
Immediately or soon after the OSCE	51	63.75
Much later	25	31.25
During the station rotation	1	1.25
No response	3	3.75

Table 3b shows a continuation of the examiners' perception of feedback practices following OSCE in Uniport. Out of the 80 (92.50%) examiners who said feedback is given after OSCE, 75 (93.75%) agreed that the feedback is given verbally and 46 (57.50%) examiners were not sure if any student has complained of not understanding the feedback provided or being given an offensive feedback. Seventy-two (63.16%) out of the 114 examiners responded that the OSCE process is not being monitored. Amongst the 42 (36.84%) examiners who believed that OSCE process is being monitored, 30 (71.43%) responded that the process is monitored by independent observers.

Table 3b. Examiners' perception of feedback practices following OSCE in Uniport

Variables	Frequency	Percentage (%)
In what form is the feedback given? (n=80)	<del></del>	*
Verbal	75	93.75
Written	5	6.25
From your experience, has any student ever complained given an offensive feedback?	d of not understanding the feedback	provided or being
Not sure	46	57.50
No	28	35.00
Yes	6	7.50
Is the OSCE process being monitored? (n=114)		
No	72	63.16
Yes	42	36.84
If yes, by who? (n=42)		
Independent observers	30	71.43
External examiners	5	11.90
Other clinical lecturers	3	7.14
Internal observers	1	2.38
OSCE board	1	2.38
Video	1	2.38
Exam officer	1	2.38
Do you consider students' feedback during board of exar	miners' meeting? (n=114)	
Not at all	50	43.86
Sometimes	32	28.07
Rarely	19	16.67
Regularly	13	11.40
Do you consider examiners' feedback during board of ex	aminers' meeting? (n=114)	
Regularly	67	58.77
Sometimes	26	22.81
Not at all	17	14.91
Rarely	4	3.51
Do you consider observers/Administrators' feedback du	ring board of examiners' meeting?	
Not at all	63	55.26
Regularly	28	24.56
Sometimes	16	14.04
Rarely	7	6.14

Table 4 shows the students' perception of feedback practices in Uniport. Out of the 90 students, 47 (52.22%) said that they have been receiving feedback. Concerning how regularly the feedback is given, 41 (87.23%) said it is given sometimes. Concerning when the feedback is given, 30 (63.83%) believed it is given much later after the exams. The commonest 45(95.74%) form of feedback received by the student is verbal feedback. Majority 41(87.23%) of the students who received feedback claimed that the feedback was well understood and friendly 42 (89.36%). Out of the 90 students, 48 (53.33%) reported that they were encouraged to express their views about the OSCE.

Table 4. Students' perception of feedback practices following OSCE in Uniport.

Variables	Frequency	Percentage (%)
Have you been receiving feedback from your examiners	s after each OSCE? (n=90)	
Yes	47	52.22
No	41	45.56
How regular was the feedback? (n=47)		
Sometimes	41	87.23
Regularly	4	8.51
Rarely	2	4.26
When was the feedback given? (n=47)		
Much later	30	63.83
Immediately/Soon after the OSCE	17	36.17
In what form was the feedback given? (n=47)		
Verbal	45	95.74
Written	2	4.26
Feedback was well understood? (n=47)		
Yes	41	87.23
No	6	12.77
Feedback was friendly? (n=47)		
Yes	42	89.36
No	3	6.38
I am not sure	2	4.26
Were you encouraged to express your views about th	e OSCEs you have participat	ed in (In respect of whether it
reflects what you were taught, clear instructions,	sufficient time, assessor's co	onduct, standardized patient's
performance, organizations? (n=90)		
Yes	48	53.33
No	42	46.67

Table 5 shows a comparative analysis of students' and examiners' perceptions of feedback practices in Uniport. When asked if feedback is given after OSCE in the department, about 70% of the examiners and 52% of the students said yes and this finding was statistically significant (p=0.009). On the other hand, about 46% of the students and 30% of the examiners indicated that they did not receive or give feedback (p=0.009).

When asked when the feedback was given, about 66% of the examiners and 36% of the students reported that it was given immediately after the OSCE and this finding was statistically significant (p=0.0014). On the other hand, more students (63.83%) as against 32.47% examiners reported that the feedback was given much later (p=0.0014). These findings show that there are significant differences in the students' and examiners' perception of feedback practices following OSCE in the University of Port Harcourt.

Table 5. A comparison between students' and examiners' perceptions of feedback practices in Uniport.

Variable	Examiner's	Students	Chi-square	P-value
	n=114	n=90		
Is feedback given after OSCE in your department				
Yes	80 (70.18)	47 (52.22)		
No	34 (29.82)	41 (45.56)		$0.009  ^{\mu *}$
I am not sure	0 (0.0)	2 (2.22)		
When is the feedback given (n1=80; n2=47)				
During the station rotation	1 (1.30)	0 (0.0)		
Immediately or soon after the OSCE	51 (66.23)	17 (36.17)		$0.0014^{\mu*}$
Much later	25 (32.47)	30 (63.83)		
In what form is the feedback given (n1=80; n2=47)				
Written	6 (7.50)	2 (4.26)		
Verbal	74 (92.50)	45 (95.74)		$0.709^{\mu}$

 $\textbf{Note:} \quad \text{*Statistically significant (p<0.05); } \mu = F isher's \ exact \ p \ (\textit{Recommended when values less than 5 are found in the cells)}.$ 

Table 6 shows the perception of the examiners concerning the impact of feedback or lack of it on students' performance. The commonest response to the question on impact of giving feedback is that feedback resulted into improved performance at the exams, 31 (58.49%). Twenty three (37.70%) examiners were not sure of the impact of lack of feedback on students' performance. Ninety-six (84.21%) examiners reported that the best time to give feedback is immediately after the exam.

Table 6. Examiners' perception on the impact of feedback or lack of it on students' performance.

Variables	Frequency	Percentages (%)		
If feedback is being given to students after OSCE, what impact has it had on students' performance in OSCE?				
(n=53)				
Improved performance at exams or reset	31	58.49		
I am not sure	11	20.75		
Better and improved understanding of OSCE	6	11.32		
Positive impact	5	9.43		
If feedback is not being given to students, what impact has it had on stu	dents' performance	? (n=61)		
Not sure	23	37.70		
No satisfactory improvement in students grades	22	36.07		
Negative impact	10	16.39		
Lack of understanding of the process and the purpose of OSCE	1	1.64		
I do not know	5	8.20		
If students are receiving feedback, when do you think is the best time	e to give the feedba	ack to have maximum		
impact on students' performance?				
Immediately after the OSCE	96	84.21		
Much later after the OSCE	14	12.28		
During the station rotation	4	3.51		

Table 7 shows the students perception on the impact of feedback or lack of it on their performance. Out of the 47 (52.22) who reported receiving feedback, 43 (91.49%) reported that their performance improved with the feedback. Out of the 43 (47.78%) students who did not report receiving feedback, 38 (88.37%) reported that the feedback would have helped in improving their performance. Seventy two (80%) out of the 90 students reported that the best time to receive the feedback is immediately after the OSCE.

Table 7. Students' perception on the impact of feedback on their performance.

Variable E	Frequency	Percentage (%)		
Did your performance in subsequent OSCEs improve because of the feedbacks you were given? (n=47)				
Yes	43	91.49		
I am not sure	4	8.51		
If you have not been receiving feedback, do you think that it would have helped in	some way? (n=	=43)		
Yes	38	88.37		
I am not sure	3	6.98		
No	2	4.65		
When do you think is the best time to receive the feedback to have maximum impact on students' performance?				
(n=90)				
Immediately/Soon after the OSCE	72	80.00		
Much later	14	15.56		
During the station rotation	4	4.44		

# 4. Discussion

This study sets out to evaluate the feedback practices following Objective Structured Clinical Examination (OSCE) in Uniport. The sociodemographic data of the examiners showed that majority of them had between 5 and 9 years experience in OSCE. Some of these examiners (14.91%) had some experience prior to the commencement of OSCE in the University. The results equally showed that all the students had experienced the OSCE. This shows that their perceptions in this study were based on their experiences.

The findings from this study show that OSCE was highly rated by the students as more than four fifth of them felt that the exams covered a wide area of knowledge, the instructions were clear and the tasks they were asked to perform reflected what they were taught. This is probably attributable to the high level of knowledge and experience of their clinical lecturers. These findings agree with the report of Majumder et al. (2019) where it was reported that 63%-91% of the final year Bachelor of Medicine, Bachelor of Surgery MBBS students and the OSCE examiners of the University of West Indies had positive views regarding the fairness of the exams, the knowledge and competencies covered and the level of organization of the exams. Similarly, Pierre, Wierenga, Barton, Branday, and Christie (2004) also observed an overwhelming acceptance of OSCE comprehensiveness (90%), transparency (87%), fairness (70%) and authenticity of the required tasks (58-78%).

The findings from this study however contrast with those of Nasir et al. (2014) who reported that only 58.9% of the final year medical students agreed that the OSCE measured knowledge and skill and only 40.4% of them agreed that the OSCE instructions were easy to understand. These differences in observation maybe due to the fact that our clinical examiners are highly experienced in the OSCE administration. However, only half (55.5%) of our student participants agreed that the time spent at each station was adequate, showing that there is still room for improvement. Additionally, the fact that less than half (47.78%) of the students disagreed that personality and social relationships affected their OSCE scores also shows that much still needs to be done to improve the confidence of the students in the exam, especially since OSCE seeks to deliver objectivity and transparency in the assessment of medical students (Varkey, Natt, Lesnick, Downing, & Yudkowsky, 2008). This finding is similar to the report of Majumder et al. (2019) though a higher proportion of students (75%) in their study reported that factors like gender, ethnicity and personality did affect the result of OSCE.

More than four-fifth (84.21%) of the examiners in this study defined feedback as a response given by the examiner to the students after an exam". This definition is agreeable with the definition by Van De Ridder et al. (2008) who defined feedback as specific information about the comparison between a trainee's observed performance and a standard, given with the intent to improve the trainee's performance. However, Van De Ridder et al. (2008) definition is more detailed.

Feedback is an essential component of medical training and is critical for learners' development (Kornegay et al., 2017). In this study, more than two-third (70.18%) of the examiners reported that feedback was given after OSCE. This is comparable to the report of Harrison, Molyneux, Blackwell, and Wass (2015) where 89% of the examiners gave feedback. Ideally, the examiners, students and the simulated patients should give and receive feedbacks after OSCE. Qureshi and Zehra (2020) also demonstrated that simulated patients' feedback is essential to enhance the communication skills of medical students and Major (2005) opined that asking simulated patients to give their views adds objectivity to OSCEs. In this study, majority of the examiners reported that feedback was given to lecturers/examiners (50.42%) and students (44.54%), only a very small proportion (5.04%) of the examiners reported that the standardized patients were also involved in the feedback. Excluding the simulated patients from the feedback process reduces the quality of the exercise.

There is an increasing preference for individualized feedback (Mulliner & Tucker, 2015; Ngim et al., 2021; Saunders, 2018; Shrivastava, Shrivastava, & Ramasamy, 2014) while making a case for individualized feedback argued that students are individuals with different learning styles, strengths and weakness and adapting the feedback to these individual differences will make the feedback more effective. However, this study revealed that majority of the examiners reported that the feedback with the students was class-based (48.75%) and sub-group based (30.00%). Workload and inadequate manpower in some clinical departments may be responsible for this practice. Group-based feedback is not as stressful as individualized feedback, but it does not allow individual's short comings to be addressed.

Concerning the timing of the feedback, research advocates that feedback is only useful to students when it is given in a timely manner (Lowe & Shaw, 2019; Mulliner & Tucker, 2015; Ngim et al., 2021). In this study, almost two-third (63.75%) of the examiners reported that the feedback was given immediately or soon after the OSCE. This is commendable because timeliness is one of the characteristics of an effective feedback (Dawson et al., 2019).

Majority of the examiners (92.50%) in this study reported that verbal feedback is provided. This seems to be agreeable with the suggestion of Black and McCormick (2010) that greater emphasis be placed on oral feedback as opposed to written feedback because oral or face to face feedback creates opportunities for the students to dialogue with the examiners. On the other hand, it disagrees with the report of Ngim et al. (2021) who observed that students preferred individualized written feedback. Whether written or verbal, the important thing is that it should be individualized and this fact was corroborated by the report of Mulliner and Tucker (2015) that students preferred individualized verbal and written feedback.

Pankonin and Myers (2017) and Killingley and Dyson (2016) noted that negative or offensive feedback will not only affect students' engagement with the feedback but will also affect their behaviour indirectly by decreasing their feeling of self-worth. The study revealed that only a small proportion of examiners (7.50%) reported that students had complained of receiving offensive feedback. Negative feedback experiences have been given as one of the reasons why students fail to act and learn from the feedback (Killingley & Dyson, 2016).

In maintaining quality assurance, it is good to get feedback from the examiners, students and observers as this will help improve the examination process. Almost two third (63.16%) of the examiners in this study reported that the exam was not monitored. Observers give invaluable feedback concerning the general organization of the exam as they take note of the flow from station to station, timing of various stations, performance of simulated patients etc. Not having monitors is a major flaw in the organization of the exam. The study further showed that during board of examiners meeting, the only feedback that is considered regularly is the examiners feedback. Students' feedback was hardly considered and this is another major flaw in the organization of the OSCE.

Concerning students' perception of feedback practices following OSCE in Uniport, half of the students reported that they have been receiving feedback following OSCE, though majority of them reported that the feedback was given sometimes. This is comparable to the report of Rüsseler et al. (2016) who observed that students complained of not receiving or receiving too little feedback. Similarly, Brown (2007) reported that the students in his study expressed discontent at the lack of feedback from their examiners. The purpose of feedback in medical education is to inform students about the difference between expected learning goals and the performance observed and students are expected to use this important information to improve their performance and achieve the defined learning goals (Sterz et al., 2021). In a situation where feedback is not being given or given irregularly, students' errors will go uncorrected and learning goals may not be achieved.

The results further showed that majority of the students (63.83%) who reported receiving feedback agreed that the feedback was given much later. This contrasts with the report of Hall, Hanna, and Quinn (2012) who observed that more than half (56.6%) of their respondents strongly agreed or agreed that they received feedback promptly. Prompt feedback enables the students to make corrections which will influence their future performance (Hall et al., 2012; Rowe & Wood, 2008).

Despite all the identified flaws with the feedback the students reported receiving in this study, more than four fifth (87.23%) of them reported that the feedback was well understood. This is very important and agrees with the report of a previous study where majority of the students rated being able to understand a feedback as the most desired thing about a feedback (Hall et al., 2012). This finding in this study may be linked to the fact that majority of these students (89.36%) also found the feedback to be friendly, supporting the suggestion of Killingley and Dyson (2016) that students' experiences of feedback are the most important indicator of the effectiveness of the feedback process.

This study revealed some discrepancies in the views of the examiners and students regarding some aspects of the feedback practices. While more than half of the students (53.33%) who reported receiving feedback agreed that they were encouraged to express their views about the OSCEs they had participated in, only 11.4% of the examiners reported that students feedback was considered in their board of examiners meeting. It may be possible that these views were sought during the verbal class-based feedback but were never considered during the board of examiners meeting where decisions regarding the exams are made. The implication of this is that the examiners missed important opportunities to make improvement in the OSCE process in Uniport.

In response to the question of whether feedback is given in the departments, a higher proportion (70.18%) of the examiners responded positively, while fewer (52.22%) proportion of the students held this view. On the other hand, 45.56% of the students indicated that feedback is not provided by the examiners, while fewer proportion

(29.82%) of the examiners had similar view. This issue of students reporting not receiving feedbacks and examiners reporting that they give feedback regularly and sufficiently has also been reported by other researches (Gigante, 2012; Gil, Heins, & Jones, 1984; Mulliner & Tucker, 2015). It maybe that the feedback was not really given or the students may have also received the feedback but were unaware that feedback has occurred (Gigante, 2012). Perhaps to prevent future occurrences, the examiners should prepare the students before the feedback session (Gigante, 2012). It could also be that those saying they did not receive feedback were not in attendance when the feedback was provided.

Another discordance in opinions was observed concerning the timing of the feedback. Whilst a higher proportion (66.23%) of the examiners reported that the feedback was given immediately or soon after the OSCE, fewer proportion (36.17%) of the students held this view and whilst a higher proportion (63.83%) of the students reported that the feedback was given much later, fewer proportion (32.47%) of the examiners agreed with this. Other researchers such as Price, Handley, Millar, and O'Donovan (2010) and Mulliner and Tucker (2015) also reported significant discord between staff and students concerning feedback practices. The findings in this study support the suggestion of Juwah et al. (2004) that students should be given the opportunity to provide feedback on their feedback to aid instructors in reflecting on its delivery. It also supports the suggestion of Mulliner and Tucker (2015) that institutions should encourage and create more opportunities for student-staff interactions and dialogue around assessment and feedback. It becomes very worrisome when one considers the response of the examiners in this study that students' feedback are not considered during the board of examiners meeting. This is a major flaw in the feedback practice in the University.

The study revealed no significant difference in the views of the examiners and students regarding the form of feedback given to the students. Majority of the examiners (92.50%) and students (95.74%) reported verbal feedback as the form of feedback given to the students. Ngim et al. (2021) also reported similarity in the views of students and staff concerning different aspects of feedback practices following OSCE.

Majority (79.24%) of the examiners in this study reported that feedback impacted positively on the students' subsequent performance in OSCE and also resulted in better and improved understanding of OSCE. Interestingly, this view was corroborated by the report of majority of the students (91.49%) that their performance in subsequent OSCEs improved because of the feedback. This may be linked to the fact that the students perceived the feedback to be friendly, supporting the argument of Brooks, Huang, Hattie, Carroll, and Burton (2019) that students' perception of the feedback must be positive so that feedback is interpreted and used to progress learning. This finding is similar to the report of Hall et al. (2012) who also observed that majority (80.1%) of the students attributed their improved performance to the feedback they received. Similarly, Bandiera, Larcinese, and Rasul (2015) and White, Ross, and Gruppen (2009) also observed marked improvement in students' academic performance following feedback sessions.

More than half (54.1%) of the examiners who reported that feedback was not being given in this study reported that lack of feedback impacted negatively on the students' performance. Interestingly, this is consistent with the view of those students who reported not receiving feedback.

Concerning the timing of feedback, majority of the examiners (84.21%) and the students (80.00%) reported that feedback is best given and received immediately or soon after the OSCE, which is consistent with the observation of Beaumont, O'Doherty, and Shannon (2011) that students felt that for feedback to be effective, they needed to receive it in time to be able to implement the advice. The finding in this study is consistent with the report of N. Black and Harden (1986) and Mulliner and Tucker (2015) that the majority of the students in their studies preferred immediate feedback and Hodder, Rivington, Calcutt, and Hart (1989) demonstrated that students' scores improved significantly following immediate feedback.

In conclusion, feedback following OSCE in Uniport is satisfactory in some aspects and deficient in other aspects. The examiners and students differed significantly in their perception of whether feedback is provided after OSCE in Uniport or not and on when it is given, but there was insignificant difference on the form of the feedback given. The students and the examiners reported that feedback had a positive impact on subsequent performance of the students in OSCE.

### 5. Recommendations

- Feedback should be structured into the OSCE process in every medical school and sufficient time and manpower should be allotted for the exercise.
- Feedback should also be received from the simulated patients and students.
- Every OSCE should be monitored by independent observers who will in turn give their feedback to improve the OSCE process.

## 6. Limitations of the Study

- This study is retrospective and is subject to recall bias.
- The strength of the views of the participants in this study were not categorized and explored

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