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# **Obstacles to Achieving Sustainability Requirements** in Faculties of Education

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# **ABSTRACT**

The current study aimed to identify the obstacles to achieving sustainability in university education, specifically from the perspective of faculty members in faculties of education. The relationship between these obstacles and certain variables, such as faculty, academic rank, and gender was also examined. The study sample consisted of 100 faculty members randomly selected from three faculties (Education, Specific Education, and Physical Education). The requirements of sustainability questionnaire was prepared and administered to measure the degree of these obstacles, consisting of 40 items distributed across four domains. t test and ANOFA were used to analyze the data. The results indicated that the degree of obstacles to achieving sustainability requirements was high. These obstacles were influenced by gender, favoring males in the areas of administration and scientific research and females in the field of curricula. The results also varied based on the faculty, with the Faculty of Physical Education facing more obstacles in the areas of scientific research and academic freedom. Additionally, the rank variable showed that professors faced more obstacles. Based on the study findings, the researchers presented a set of recommendations, most importantly emphasizing the need for university administration to update its vision and strategies to address several key points to reduce these obstacles.

#### Introduction

The world is grappling with significant challenges that endanger humanity, increasing responsibilities institutions of universities to equip their students with the skills needed to address these issues. Faculties of education, in particular, play a major role in providing students with knowledge and skills related to sustainability to mitigate life's risks. The current education system falls short in

meeting the demands of sustainable development and creating a more sustainable society. It fails to adequately prepare the workforce for market needs or build a knowledge base that can drive innovation and meet societal demands (Lileh, 2006).

Sustainable development is a critical concern for developing nations, including Egypt. It requires a collective effort from all members of society to leverage scientific advancements and



enhance the quality of life. Achieving this goal necessitates a holistic approach that considers all development, encompassing aspects ofscientific. economic. social. and cultural Sustainable dimensions (SalÓte, 2015). development is a multifaceted process transformation. It involves individuals. all communities. sectors (governmental. governmental and private), and institutions, guided by appropriate laws and regulations. This collaborative effort aims to achieve integrated and harmonious growth across all aspects of society (Mechik & Hauff, 2016, p. 110).

Many educational institutions are not prepared to achieve sustainable development. They are resistant to quality systems and have an automatic bias towards preserving the past and its accumulations. They rarely work for the future and its requirements and decisions (Zaher, 2003). The term sustainable development appeared in association with environmental schools and the concept of the environment, which is the common term. However, there are new challenges facing universities that wish to achieve sustainable development. It is not enough to rely on environmental quality as an entry point for investing in natural resources. Rather, society must participate and achieve their self-sufficiency while providing equality and justice as a basis for building people for sustainable development (Badawi & Mujahid, 2010). Sustainable development for education is defined as "an educational vision that seeks to find a balance between human and economic prosperity, cultural traditions. and sustainability of natural and environmental resources for a better life for the individual and society in the present and future" (UNESCO, 2008, 2). It is clear that sustainable education contributes to confronting poverty, protecting improving the environment, and health conditions. It also works to enhance social cohesion (Lopez, 2000, 40).

Sustainable development requires lifelong education that serves all people. It is based on all fields of knowledge, and integrates learning with all life activities. University education is considered one of the most important sources of economic progress, social and cognitive

advancement. It works to form human capital, which is one of the pillars of sustainability and human development. The priorities of university education include belonging and awareness, preserving the environment, acquiring skills, developing creative thinking and teamwork (Awis, 2008, 11). It has become one of the tasks of university education to provide students with knowledge and skills, work to increase their enthusiasm towards themselves and towards others, maintain the form and meaning of relationships within society and on the global level, and be productive and have the ability to manage natural resources effectively, while providing a model of the skills and values that everyone aspires to (Hokins & Mckeown, 2001, 237).

There are various requirements for sustainable development, most notable among which are the following:

## - Technological requirements:

The present age witnesses scientific and technological revolutions in various spheres of life that brought about change and development in the lives of individuals and communities.

#### - Economic requirements:

They are manifested in increasing production, reliance on domestic savings as a source of investment, development of local capacity, and fair distribution of income and wealth in society to eliminate poverty.

### - Social requirements:

They are manifested in improving education, health levels and well-being of all citizens, raising interest in the middle and working class, deepening values such as love of knowledge and hard work.

# - Cultural requirements:

They are manifested in raising awareness of societal thought and culture issues, consolidating values of reasoning versus rote-learning, emphasizing objectivity and openness to other cultures.

# - Environmental requirements:

They are manifested in promoting the efficiency of natural resources and effective governance of these resources (e.g., water, air, energy, mineral wealth, coastal environment) and adopting sustainable production and consumption patterns (Biasutti, et al., 2016; SalÓte, 2015).

To achieve the SD requirements, there is a need to:

- Study all aspects of reality that call for development.
- Study optimal outcomes and distinguish among important, less important, highpriority, and temporarily impossible outcomes.
- Study possible means to achieve those outcomes and ways to overcome the difficulties.
- Manage cooperation and interaction among those interested in development.
- Prepare plans for integrative development; plans for each sector of society (Handayani, 2019, p.45)

Many studies confirmed that higher education faces several. obstacles to sustainability. For example, Shevard's study (2010) aimed to describe the reasons for the reluctance of higher education adopt sustainable development Australian in universities. The study found that one of the reasons for Australian universities' reluctance is the lack of attention to global problems and the weak role of society in influencing educational policies in universities, and that faculty members do not have a role in guiding students towards sustainable lifestyles. A study by Mujahid (2010) aimed to study quality assurance in higher education as an entry point for sustainable development in Egyptian society. The study arrived at standards for quality assurance in higher education and a mechanism for activating these standards achieve sustainable development in its environmental, social, and economic dimensions. One of the most important obstacles was the insistence on traditional management and the lack of conviction in the work and new thinking of total quality management. The factor of the small budget allocated for producing distinguished research and the lack of a suitable climate for scientific research in Egyptian universities also represents a significant obstacle.

In addition, the US Department of Education (2011) conducted a study entitled "An Action Report on the Summit on Education for Sustainability." The summit brought together

leaders from higher education, industry. non-governmental commerce, labor, and organizations to form a shared vision and strategies for the role of education in developing a green and sustainable economy. The summit report concluded with a set of challenges, the most important of which is that there is no definition of the concept sustainability, nor the competencies required for sustainability. There is also a challenge in integrating the topic of sustainability into university curricula, a shortage of student competency measures, a lack of resources and tools for incorporating the teaching sustainability in universities, and a lack of information about the skills and competencies required to be included in programs and degrees. In their study, Krizik et al., (2012) described four university treatments of the sustainability topic that were applied at the University of The study concluded that the Colorado. application of sustainability is based on experiences from the learning, teaching, and university management processes, and that there are areas that faced challenges that require coordination, such as research, student activities, and administrative facilities.

In her study, Selim (2019) determined some requirements of sustainable development, which could be integrated into secondary stage chemistry curriculum in Egypt, and to describe how to integrate these requirements in the curriculum in Egypt, and to describe how to integrate these requirements in the curriculum. Fawzy, et al., (2021) also indicated that adopting a national sustainable development strategy that includes all entities, institutions, members of society and those affected by its results in the short and long term is a must.

All of the above places the responsibility on universities to reconsider their strategies to achieve what sustainable education dictates, in order to provide qualified cadres who participate in social services, develop the human environment and life, and meet the requirements of sustainable development. Universities must follow policies and practices to achieve sustainability while providing student services and linking them to all global forums for

sustainable development. The sustainability of educational institutions requires long-term improvements to the components of the educational process to improve the quality of human life for present and future generations.

To sum up, the obstacles hindering sustainability in higher education may include: traditional management instead of total quality management, a distance from modern curricula that include the requirements of the times and its changes, where the human element is the actor. The issue of human development is one of the most important issues for building the individual and their effective participation in sustainable development. Other obstacles include a teaching style based on lecturing and memorization, a lack of practical application, and a focus on the theoretical aspect. The evaluation method of educational outcomes is also one of the most important obstacles we face, as it relies on measuring the student's theoretical achievement of the scientific material, meaning that the criterion of excellence is the grade that the student obtains. Another obstacle to sustainable development is the low level of scientific research in universities, due to several reasons, including the weak budget allocated for producing distinguished research.

According to the researchers' knowledge, there is not an abundance of studies that have addressed sustainability in higher education, hence the idea of the study arose, and the researchers limited the application of the study tool to some faculties of education at Port Said university.

#### **Statement of the problem**

There is a need to identify the obstacles to achieving the requirements of sustainability from the perspective of faculty members. Thus, the present study sought to find answers to the following main question:

What are the obstacles to achieving the requirements of sustainability in faculties of education?

The following sub questions were also answered:

- 1. What are the obstacles to achieving the requirements of sustainability from the perspective of faculty members in faculties of education?
- 2. What are the obstacles to achieving the requirements of sustainability from the perspective of faculty members in faculties of education, according to the variables of (faculty, academic rank and gender)?

## Aim of the study

This study aimed to investigate the obstacles to the sustainability of higher education from the perspective of faculty members.

# Significance of the study

- For faculty administrators: The current study can help administrators identify the most significant obstacles and work to overcome them.
- For the Ministry of Higher Education: The study can help the ministry reconsider its strategies and plans to improve the sustainability of higher education, by proposing solutions and alternatives.
- For faculty members: The study can encourage faculty members to change their plans and strategies to align with the requirements of achieving sustainability.

#### **Delimitations**

The study delimitations were as follows:

- **Human limitations:** The study was limited to faculty members at the faculties education in Port Said university. A number of faculty members (100) participated in the study.
- **Spatial limitations:** The study was limited to the University of Port Said.
- **Temporal limitations:** The study was conducted during the academic year 2023/2024.

#### **Definition of the study term**

Obstacles to the sustainability of higher education are a set of issues and problems that hinder the achievement of sustainability and can be identified in faculty administration, scientific research, teaching strategies and methods, evaluation methods,

and academic freedom of faculty members.

## **Study procedures**

The study followed the following procedures:

- A random sample of 100 faculty members was selected from faculty of education, specific education and physical education in Port Said University.
- A 40-question questionnaire was developed after its validity and reliability were confirmed.
- The questionnaire was distributed to the study sample and three levels of evaluation were determined for each question. Appropriate statistical analysis was used to analyze the data.

### **Independent variables**

In this study, two main independent variables were identified:

- **Faculty type:** This variable refers to the type of faculty to which the faculty member belongs (education, specific education, physical education).
- Academic rank: This variable refers to the academic level reached by the faculty member (assistant lecturer, lecturer, assistant professors, professors).
- **Gender:** It refers to whether the participant is a male or a female.

The dependent variable in this study is the "degree of obstacles to sustainability in university education". This means that we seek to measure the extent to which faculty members' perspectives are consistent with the concept of sustainability in several aspects, and to identify the obstacles that limit the application of sustainability principles in the educational process.

	Variable	Number
Gender	Male	25
Gender	Female	75
	Education	30
Faculty	Specific Education	35
	Physical Education	35
	Professor	10
Academic rank	Assistant professor	10
	Lecturer	25
Talik	Assistant lecturer	30
	Demonstrator	25

Table 1. the distribution of the participants according to the study variables

#### **Study instrument**

Requirements of sustainability questionnaire:

- The initial version of the instrument included (100) items. It was presented in its initial version to three experts in the field to verify the suitability of the items for the domains they cover and the linguistic phrasing of the items. A criterion of 80% or more was adopted to keep the item, and some items were rephrased, and some were deleted. The final version of the questionnaire consisted of (40) items across four domains.
- Validity: The initial version of the questionnaire comprised (100) items. It was presented to three experts to assess the

- relevance of the items to the intended areas of measurement and the clarity of the language used. An item was retained if it received a rating of 80% or higher. Some items were revised, and others were eliminated. The final version consisted of (40) items distributed across four domains.
- Reliability: The reliability of the questionnaire was established using the test-retest method. The study instrument was applied to a sample of (30) faculty members not included in the main study, with a two-week interval. Pearson's correlation coefficient for the domains was (0.85), and the degree of internal consistency for the domains using Cronbach's alpha was (0.86).

#### **Results and Discussion**

To address the first research question, "What are the obstacles to achieving sustainability requirements in faculties of education?", the

researcher identified a list of 40 obstacles, categorized into four domains, using a 3-point Likert scale. After validation, the final version of the questionnaire was established.

**Table 2.** Establishing the mean and standard deviation of the domains of the questionnaire

Domain	Mean	Standard Deviation	Impact
Faculty Administration	2.52	0,29	High
Scientific Research	2.41	0,4	High
Strategies & Evaluation	2.18	0.12	Average
Academic Freedom	2.01	0.47	Average
Total	2.31	0.25	High

Table 2 indicates that the overall level of obstacles to sustainability in higher education is high, with a mean of (2.31) and a standard deviation of (0.25). The most significant obstacles were found in college administration, followed by scientific research, curricula, and academic freedom. This ranking can be attributed to the fact that administrative tasks are typically carried out by a limited group of

faculty members, who may not be involved in the administrative decisions made by the faculty and university councils. These decisions may not align with their aspirations and beliefs. This finding supports the results of other studies like those of Krizek et al., (2012) and Shephard (2010).

1-Results of the first domain (faculty administration)

Table 3. Mean and standard deviations of obstacles in the field of faculty administration in higher education

Item	Mean	Standard Deviation	Impact
Lack of ICT utilization in decision-making processes	2.32	0.77	Average
Limited ability to adapt to local, regional, and global changes	2.27	0.73	Average
Departments lack autonomy in selecting their heads	2.24	0.62	High
Universities do not have the freedom to choose their presidents	2.35	0.79	High
A disconnect between university goals and values and the performance and behavior of faculty members	2.4	0.49	High
A weak foundation for administrative planning and employee guidance	2.4	0.78	High
A centralized approach to most university administrative systems	2.5	0.5	High
A lack of awareness of internal institutional strengths, weaknesses, opportunities, and threats	2.51	0.49	High
A lack of clear strategic vision for colleges	2.52	0.79	High
Limited faculty involvement in high-level administrative decisions.	2.56	0.49	High
A disconnect between managerial vision and reality	2.6	0.49	High
A lack of focus on sustainable development goals	2.6	0.49	High
reliance on traditional management practices rather than comprehensive quality management	2.6	0.49	High
A lack of a competitive focus in management	2.6	0.49	High
Faculty members lack the autonomy to select deans	2.6	0.49	High
A failure to delegate authority to middle and lower management.	2.76	0.42	High
Total	2.53	0.24	High

Table 3 clearly shows that there are significant obstacles to sustainability in

university management. The average score for management-related obstacles was high at 2.53,

with a standard deviation of 0.29. This suggests that universities still rely heavily on traditional, centralized management practices. Implementing necessary administrative changes requires significant time, effort, and financial resources, which are often lacking. Additionally, the associated costs can be prohibitive. These

findings align with previous research by Shephard (2010) and Badawi and Mujahid (2010), which indicated that universities tend to focus on their traditional role of education.

# 2-Results of the second domain (scientific research)

**Table 4.** Mean and standard deviations of obstacles to sustainable scientific research in higher education

Item	Mean	Standard Deviation	Impact
Time constraints on faculty for research and scholarly output -	2.4	0.49	Average
Insufficient incentives for researchers	2.46	0.8	Average
Lack of coordination between universities and industry to leverage research findings	2.47	0.6	High
Low level of scientific research	2.49	0.49	
Limited research capabilities among faculty to produce research	2.6	0.49	High
Absence of a conducive environment for scientific research	2.6	0.49	High
Brain drain of researchers seeking better job prospects	2.64	0.76	High
Lack of coordination among researchers in similar departments	2.8	0.4	High
Absence of research ethics	1.62	0.81	Average
Total	2.45	0.4	High

The results in Table 4 reveal a high degree of impediments to the sustainability of university education in the field of scientific research. The calculated mean is 2.45, and the standard deviation is 0.4. The items in the second category exhibited particularly high scores. This can be attributed to several factors, including: insufficient financial and moral support from the university, lack of faculty members' full-time dedication to research, inadequate resources for research, absence of channels for connecting the

university with the external community to market research outputs, the brain drain as a significant factor in the decline of research output, the conflict of roles among faculty members in different faculties, limited time, and a lack of a clear vision for research. These findings align with the studies of Krizek, et al. (2012), Badawi and Mujahid (2010).

# 3-Results of the third domain (strategies& evaluation)

Table 5. Mean and standard deviations of obstacles to sustainable strategies and evaluation in higher education

Item	Mean	Standard Deviation	Impact
Overreliance on rote memorization in teaching	2.8	0.4	High
Misalignment between curricula and external market demands	2.6	0.49	High
Excessive focus on theoretical knowledge in assessments, neglecting practical application	2.5	0.5	Average
The need to revamp curricula to align with current cognitive and scientific advancements	2.22	0.41	Average
Absence of online courses in education	2.2	0.41	Average
Limited diversity in assessment methods, with excessive reliance on exams	2.2	0.4	Average
Inadequate use of technology in teaching and assessment	2	0.63	Average
Total	2.18	0.12	Average

Table 5 indicates that the degree of obstacles to the sustainability of university education in the third domain is moderate, with a calculated mean of 2.18 and a standard deviation of 0.12. These results can be attributed to several factors, including the prevalence of traditional teaching methods in universities, a lack of institutional focus on developing faculty performance to enhance efficiency and meet local market demands, limited availability of course materials for students, the absence of a clear strategy for

teaching methods, with most instructors relying on personal experience, and a deficiency in faculty development programs. These shortcomings are primarily responsible for the moderate level of obstacles in the third domain. These findings align with the studies conducted by the U.S. Department of Education (2010), Badawi and Mujahid (2010) and Selim (2019).

# 4-Results of the fourth domain (academic freedom)

**Table 6.** Mean and standard deviations of obstacles in the field of academic freedom in higher education academic freedom

Item	Mean	Standard Deviation	Impact
Low faculty salaries that do not match their qualifications	2.5	0.8	High
Failure to capitalize on faculty members' innovative ideas	2.4	0.8	High
Faculty freedom is contingent upon the approval of upper administration	2.83	0.79	High
Administrative overreach restricts faculty autonomy	2.37	0.56	High
Excessive constraints on faculty hinder academic excellence	2.3	0.9	Average
Deterioration of faculty members' social status	2.26	0.79	Average
Job insecurity for faculty members due to external factors	2.2	0.96	Average
Brain drain of talented faculty members	2	0.89	Average
Total	2.01	0.47	Average

Table 6 illustrates that the degree of obstacles to the sustainability of university education in the field of academic freedom for faculty members is moderate, with a calculated mean of 2.01 and a standard deviation of 0.47. These results can be attributed to several factors. including: the significant burdens and demands of life that may negatively impact the social and economic stability of faculty members, low faculty income that may hinder their role and performance in the external community, the failure to utilize faculty ideas and opinions, which negatively impacts their professional performance and academic freedom, and the influence of favoritism in faculty appointments, resulting in faculty members who lack mature

ideas. These findings are consistent with the study conducted by Badawi and Mujahid in 2010, which highlighted the poor conditions of faculty members, their instability, and the lack of a free environment for research and creativity.

To answer the second research question, which stated that "What are the obstacles to achieving sustainability requirements from the perspective of faculty members in faculties of education, considering the variables of gender, faculty and rank?" the mean and standard deviation were used and the results are presented in Table 7.

# 1-Results related to faculties of education

Domain	Faculty	Mean	<b>Standard Deviation</b>	t value	significance
	Education	2.52	0.29		
Faculty Administration	Specific Education	2.52	0.26	1.30-	0.05
	Physical Education	2.55	0.27		
	Education	2.48	0.37		
Scientific Research	Specific Education	2.36	0.43	4.27	0.05
	Physical Education	2.4	0.4		
Strategies & Evaluation	Education	2.16	0.11		
	ies & Evaluation   Specific Education		0.15	4.49-	0.05
	Physical Education	2.21	0.14		
	Education c Freedom Specific Education		0.54		
Academic Freedom			0.23	2.1	0.05
	Physical Education	2	0.3		
	Education	2.23	0.25		
Total	Total Specific Education Physical Education		0.27	1.26	0.05
			0.26		

Table 7. Obstacles to the sustainability of university education according to the faculty

Table 7 shows that there are statistically significant differences in the average responses of faculty members based on the variable of college in the areas of assessment strategies and methods (p-value = 0.04), scientific research (p-value = 0.02), and college administration (p-value = 0.13). These differences favor the faculty in the faculty of specific education. This result can be attributed to the fact that faculty members in the faculty of specific education have more job stability compared to faculty members in other faculties, which is reflected in their responses in these areas.

Regarding assessment strategies and methods, the results favored the faculty of education. This difference may be due to the fact that the faculty of education places more emphasis on conducting workshops for faculty members. Government universities tend to have more control over such obstacles. As for the lack of differences in the area of administration, it is because many faculties face similar challenges, such as the centralization, the lack of delegation of authority, and the absence of a strategic vision.

# 2- Results related to gender

	Table 8. Obstacles	he sustainabilit	ty of university	education	according to the gend	ler
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Domain	Gender	Number	Mean	Standard Deviation	t value	significance
Faculty Administration	Male	25	2.43	0.18	6.45	0.05
raculty Administration	Female	75	2.57	0.31	0.43	0.03
Scientific Research	Male	25	2.38	0.46	2.99	0.05
Scientific Research	Female	75	2.47	0.36	2.99	0.05
Stratagies & Evaluation	Male	25	2.21	0.15	4.49	0.05
Strategies & Evaluation	Female	75	2.16	0.11	4.49	0.03
Academic Freedom	Male	25	1.46	0.11	3.43	0.05
Academic Freedom	Female	75	2.25	0.35	3.43	0.03
Total	Male	25	2.21	0.19	10.42	0.05
Total	Female	75	2.4	0.25	10.42	0.03

Results in Table 8 shows that there are statistically significant differences between the averages of the obstacles to the sustainability of education in the faculties of education according to the gender variable in the overall score of the domains. The overall score was 10.42 with a significance level of 0.05, and the differences were in favor of females in the areas of faculty administration and academic freedom, as evidenced by the higher mean than the mean of females. In contrast, the differences were in

favor of males in the areas of curricula, teaching methods, and scientific research, as evidenced by their higher mean than that of females. This is attributed to the fact that females have succeeded in the areas of management and leadership, especially as they have aspirations to assume leadership positions in societies that encourage women's leadership and provide programs and grants to develop performance.

#### 2- Results related to rank

**Table 9.** Obstacles to the sustainability of university education according to the rank

Domain	academic rank	Mean	Standard Deviation	significance
	Professor	2.51	0.02	0.05
	Assistant professor	2.52	0.33	0.05
Faculty Administration	Lecturer	2.22	0.2	0.05
	Assistant lecturer	2.52	0.33	0.05
	Demonstrator	2.22	0.2	0.05
	Professor	2.54	0.02	0.05
	Assistant professor	2.36	0.44	0.05
Scientific Research	Lecturer	2.69	0.12	0.05
	Assistant lecturer	2.36	0.44	0.05
	Demonstrator	2.69	0.12	0.05
	Professor	2.19	0.12	0.05
	Assistant professor	2.14	0.07	0.05
Strategies & Evaluation	Lecturer	2.31	0.04	0.05
Suaregies & Evaraaren	Assistant lecturer		0.07	0.05
	Demonstrator	2.31	0.04	0.05
	Professor	2.36	0.39	0.05
	Assistant professor	2.11	0.39	0.05
Academic Freedom	Lecturer	1.38	•,•1	0.05
	Assistant lecturer	2.11	0.39	0.05
	Demonstrator	1.38	•,•1	0.05
	Professor	2.42	0.11	0.05
	Assistant professor	2.32	0.3	0.05
Total	Lecturer	2.32	0.05	0.05
	Assistant lecturer	2.32	0.3	0.05
	Demonstrator	2.32	0.05	0.05
Total		2.34	0.25	0.05

Table 9 indicates that there are differences between the mean values. To confirm that these differences between the mean values are statistically significant based on the rank variable, a one-way analysis of variance (ANOVA) was conducted. Table 9 presents the analysis of variance for the differences between groups based on the rank variable."

Domain	source of variance	Sum of squares	fd	Mean of the sum of squares	F value	significance
Faculty Administration	Among groups	0,13	2	0.06		
	Within groups	69.2	827	0.08	0.89	0.05
	Total	69.3	829			
	Among groups	13.8	2	6.9		
Scientific Research	Within groups	119.5	827	0.14	47.7	0.05
	Total	133.3	829			
Church a in a 0	Among groups	3,3	2	1.67		
Strategies & Evaluation  Academic Freedom	Within groups	10.1	827	0.01	136.6	0.05
	Total	13.4	829			
	Among groups	79.9	2	39.9		
	Within groups	105	827	0.12	314.7	0.05
	Total	184.4	829			
	Among groups	0.97	2	0.48		
Total	Within groups	54.09	827	0.06	7.43	0.05
	Total	66.5	820			

**Table 10.** ANOVA for academic rank

The results in Table 10 indicate that there are significant differences in the average responses of the study participants based on the rank variable across all areas of the sustainability obstacles questionnaire. The results confirm that the highest differences are towards the professor rank, which can be attributed to their years of experience that have led to a clearer perception of obstacles. The results also indicate that the lowest rank was for the teaching assistant position, due to the limited years of experience of teaching assistants in all areas of the questionnaire.

#### Conclusion

In conclusion, this study revealed significant hindering the achievement obstacles sustainability in university education from the perspective of faculty members within faculties of education. The findings highlight a generally high degree of perceived obstacles, with variations observed across gender, faculty, and academic rank. Specifically, the study identified gender-based differences in perceptions related administration, scientific research, curricula, with males perceiving more obstacles in the former two and females in the latter. Furthermore, faculty members at the Physical Education faculty reported greater challenges in scientific research and academic freedom, while professors, regardless of faculty, experienced a higher degree of obstacles overall. These results underscore the complex and multi-faceted nature of the obstacles to sustainability in higher education. Therefore, it is crucial for university administrations to proactively address these identified obstacles by revising their vision and strategies.

#### Recommendations

The current research recommends the following:

- 1. The necessity of developing a clear strategy and vision for faculty administration and publishing it on official websites.
- 2. Distributing of administrative leadership among different individuals and avoiding its concentration in the hands of a few.
- 3. Delegating a part of authority to middle and lower levels.
- 4. Providing a suitable environment for scientific research.
- 5. Adopting a guide for strategies and assessment methods for faculties of education.
- 6. Raising the academic freedom for faculty members and encouraging and supporting innovation.

7. Developing interventions to improve sustainability practices in higher education institutions.

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