

ABET-Accredited Programs in Non-GCC Muslim-Majority Countries: A Comparative Study

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Abstract: Higher education institutions increasingly pursue program accreditation due to its significant benefits for students, faculty, and employers. Graduating from an accredited program provides students with distinct advantages over non-accredited alternatives. However, despite the growing emphasis on accreditation, a comparative study of ABET-accredited programs in non-GCC Muslim-majority countries remains absent from existing literature. This paper conducts a quantitative analysis of all currently ABET-accredited programs in these regions, addressing a critical research gap. Additionally, maintaining accreditation poses ongoing challenges, and some programs eventually lose their accredited status. Thus, this study also examines the historical trends and current status of previously accredited programs in non-GCC Muslim-majority nations. The findings aim to provide valuable insights for universities, accreditation bodies, and policymakers—particularly in non-GCC Muslim-majority countries—to strengthen program quality and compliance with ABET standards.

Keywords: ABET; Accreditation; Engineering; Technology; Program

Introduction

Quality education stands as a key objective under the United Nations' Sustainable Development Goals (SDGs) [1]. Institutional accreditation serves as a recognized marker of educational quality, functioning as a rigorous peer-review mechanism to assess whether academic programs meet internationally benchmarked standards. However, accreditation is not a permanent status; programs must consistently maintain their quality standards to undergo successful periodic renewal.

Various global accreditation bodies exist, each specializing in different academic disciplines. Among these, ABET accreditation represents the highest standard of quality assurance for applied science, computing, engineering, and engineering technology programs worldwide.

Reference [2] examined efforts to achieve accreditation in Turkish engineering programs, with a specific focus on the insights and advantages gained during the development of the undergraduate Electrical and Electronics Engineering program at Eastern Mediterranean University. The study highlighted key findings as more Turkish universities pursue ABET accreditation. Firstly, Turkish engineering schools will decrease

their traditionally high total credit requirements. Secondly, humanities and social science electives—often absent in some programs—will be incorporated into the curriculum.

Research on ABET-accredited programs in Kazakhstan is very limited. Nevertheless, educational best practices have been explored through workshops in the country. For example, a workshop organized by the Society of Petroleum Engineers (SPE) Talent Council and the Kazakh National Technical University (KazNTU) took place in Almaty, Kazakhstan, in November 2009 [3].

While the Lebanese International University (LIU) currently does not offer any ABET-accredited programs, its School of Engineering has been proactively working to develop and continuously improve its engineering curricula. These efforts focus on implementing an assessment framework to evaluate how effectively graduating students meet the intended learning outcomes of their programs. This initiative is part of LIU's broader strategy to align its programs with ABET standards in preparation for future accreditation [4].

Reference [5] provides an overview and analysis of the present state of engineering and technical education in Brunei Darussalam, along with its strategic planning and future direction. Additionally, it examines the reorganization and development of technical and engineering programs to meet accreditation standards set by professional bodies under institutions affiliated with international agreements like the Dublin, Sydney, and Washington Accords.

The Chemical Engineering program at Indonesia's Institute of Technology Bandung has implemented several effective practices and innovations in its continuous quality improvement efforts during preparation for ABET reaccreditation, as documented in Reference [6].

Reference [7] presents a proposed national framework for accrediting engineering programs in Tunisia. The study seeks to assist the Tunisia's MHESR in program evaluation by analyzing established accreditation systems. Key recommendations include restructuring the habilitation process into international-standard licensure and accreditation phases, while clarifying the functions of Tunisia's IEAQA quality assurance body.

The research in [8] sought to determine how closely the academic outcomes of the engineering programs at the University of Jordan aligned with ABET standards. Key findings showed that accredited engineering departments actively work toward meeting program outcomes derived from ABET's international accreditation criteria. This is accomplished through a systematic, ongoing, and comprehensive evaluation of all aspects of the teaching process.

The International University of Rabat in Morocco is pursuing ABET accreditation to enhance its global competitiveness. As part of this initiative, a team of five Worcester Polytechnic Institute students completed an Interactive Qualifying Project—a Bachelor of Science degree requirement—to assist the university in preparing its Computer Science program for ABET accreditation. Their analysis found that many courses had unclear descriptions and syllabi, making program quality assessment difficult. The

report recommended providing faculty with better course-evaluation tools and increasing awareness of ABET accreditation's benefits across the university [9].

The study referenced as [10] presented a brief statistical analysis of ABET accreditation across 22 Arab countries, with data current as of October 1, 2017. The findings indicated that 11 Arab nations had ABET-accredited programs, amounting to 358 programs in total. The majority of these programs were undergraduate degrees, offered by 62 higher education institutions.

Finally, the study in [11] proposed a method for achieving and evaluating multiple ABET student outcomes through International Virtual Exchange (IVE), examining a collaborative case study between U.S. universities and institutions in the West Bank, Occupied Palestinian Territories. Results demonstrated that IVE participants displayed stronger global competencies compared to non-IVE students. Furthermore, Palestinian IVE teams consistently outperformed their non-IVE counterparts in teamwork assessments.

Related Work

Reference [12] provided a concise overview of all ABET-accredited academic programs—ranging from associate to master's degrees—at Saudi universities and colleges in 2015. The study found that, unlike Saudi Arabia, other GCC countries lacked ABET accreditation for programs like aerospace engineering, biomedical technology, mining engineering, non-destructive evaluation technology, nuclear engineering, and polymer engineering technology. According to [12], these programs were exclusively ABET-accredited in Saudi institutions within the GCC region.

The study in [13] examined ABET-accredited programs across different degree levels in Saudi higher education institutions as of 2021. It found that the number of bachelor's degree programs with ABET accreditation had more than tripled since 2015, as previously noted in [12]. Additionally, [12] reported that King Fahd University of Petroleum & Minerals (KFUPM) stands as the only university in Saudi Arabia with ABET-accredited programs at every degree level.

While existing literature includes some studies on ABET-accredited programs in non-GCC Muslim-majority countries, these investigations remain limited in scope, typically focusing on either individual institutions or single countries within the region. Most publications report institutional case studies of successful accreditation processes conducted by faculty at their home universities. Notably, no comprehensive study has systematically examined ABET-accredited programs across all non-GCC Muslim-majority nations - a significant gap in the current research landscape. While previous work has partially addressed this through analyses of Saudi Arabian [12-18] and GCC country programs [19], a broader regional assessment remains unfulfilled.

Comparative Analysis

Table 1 [20] displays the count of ABET-accredited programs in non-GCC Muslim-majority countries as of 2025. According to the table, Indonesia is the only country with an ABET-accredited associate degree program. Jordan leads in ABET-accredited bachelor's degree programs, followed by Turkey. However, none of the listed non-GCC Muslim-majority countries offer ABET-accredited master's degree programs.

Determining how many eligible programs in these countries could apply for ABET accreditation at different degree levels is challenging. As a result, calculating the percentage of eligible programs that are ABET-accredited is not feasible. Additionally, since ABET does not accredit Ph.D. programs, this study focuses solely on associate, bachelor's, and master's degree programs.

Table 1. Number of active ABET-accredited programs in non-GCC Muslim-majority countries (2025)

Countries	Associate	Bachelor's	Master's
Brunei Darussalam	0	1	0
Egypt	0	45	0
Indonesia	1	11	0
Jordan	0	83	0
Kazakhstan	0	3	0
Lebanon	0	54	0
Morocco	0	3	0
Palestine	0	10	0
Tunisia	0	4	0
Turkey	0	73	0
Total	1	287	0

Table 2 [20] presents the count of higher education institutions offering ABET-accredited programs in non-GCC Muslim-majority countries as of 2025. The data reveals that Jordan has the highest number of institutions with ABET-accredited bachelor's degree programs. Among these, the University of Jordan leads with 19 accredited programs, followed by the Jordan University of Science and Technology with 14. Meanwhile, Egypt, Lebanon, and Turkey each have nine higher education institutions with ABET-accredited bachelor's degree programs.

Table 2. Number of higher education institutions offering ABET-accredited programs in non-GCC Muslim-majority countries (2025)

Countries	Associate	Bachelor's	Master's
Brunei Darussalam	0	1	0
Egypt	0	9	0
Indonesia	1	4	0

Jordan	0	12	0
Kazakhstan	0	1	0
Lebanon	0	9	0
Morocco	0	1	0
Palestine	0	2	0
Tunisia	0	2	0
Turkey	0	9	0
Total	1	50	0

Table 3 [20] displays the count of ABET-accredited programs in non-GCC Muslim-majority countries that hold international mutual recognition agreements as of 2025. The data shows that none of these countries have such agreements for associate or master's degree programs. At the bachelor's level, Jordan leads with the highest number of ABET-accredited programs under international mutual recognition, followed by Egypt. Notably, all 38 ABET-accredited bachelor's degree programs in these countries are recognized exclusively under the Seoul Accord, as highlighted in Table 3.

Table 3. Number of ABET-accredited programs covered by international mutual recognition agreements in non-GCC Muslim-majority countries (2025)

Countries	Associate	Bachelor's	Master's
Brunei Darussalam	0	0	0
Egypt	0	10	0
Indonesia	0	2	0
Jordan	0	15	0
Kazakhstan	0	3	0
Lebanon	0	7	0
Morocco	0	1	0
Palestine	0	0	0
Tunisia	0	0	0
Turkey	0	0	0
Total	0	38	0

Table 4 [20] outlines the accreditation commissions responsible for ABET-accredited programs in non-GCC Muslim-majority countries as of 2025. The table indicates that all four ABET accreditation commissions oversee accreditation activities at both associate and bachelor's degree levels in these nations. These commissions include the Applied and Natural Science Accreditation Commission (ANSAC), Computing Accreditation Commission (CAC), Engineering Accreditation Commission (EAC), and Engineering Technology Accreditation Commission (ETAC).

Table 4. Recognized accreditation commissions overseeing ABET-accredited programs in non-GCC Muslim-majority countries (2025)

Countries	Associate	Bachelor's	Master's
Brunei Darussalam	-	EAC	-
Egypt	-	ANSAC, CAC, EAC	-
Indonesia	ETAC	CAC, EAC	-
Jordan	-	ANSAC, CAC, EAC	-
Kazakhstan	-	CAC	-
Lebanon	-	ANSAC, CAC, EAC	-
Morocco	-	CAC, EAC	-
Palestine	-	EAC	-
Tunisia	-	EAC	-
Turkey	-	EAC	-

Table 5 [20] presents the count of ABET-accredited programs under ANSAC in non-GCC Muslim-majority countries for 2025. The data reveals that Jordan hosts the highest number of ANSAC-accredited bachelor's degree programs among these nations.

Table 5. Number of ANSAC-evaluated ABET-accredited programs in non-GCC Muslim-majority countries (2025)

Countries	Associate	Bachelor's	Master's
Brunei Darussalam	0	0	0
Egypt	0	3	0
Indonesia	0	0	0
Jordan	0	12	0
Kazakhstan	0	0	0

Lebanon	0	1	0
Morocco	0	0	0
Palestine	0	0	0
Tunisia	0	0	0
Turkey	0	0	0
Total	0	16	0

Table 6 [20] displays the quantity of ABET-accredited programs under CAC in non-GCC Muslim-majority countries for 2025. The data indicates that Jordan has the most CAC-accredited bachelor's degree programs, with Egypt ranking second.

Table 6. Number of CAC-evaluated ABET-accredited programs in non-GCC Muslim-majority countries (2025)

Countries	Associate	Bachelor's	Master's
Brunei Darussalam	0	0	0
Egypt	0	10	0
Indonesia	0	2	0
Jordan	0	15	0
Kazakhstan	0	3	0
Lebanon	0	7	0
Morocco	0	1	0
Palestine	0	0	0
Tunisia	0	0	0
Turkey	0	0	0
Total	0	38	0

Table 7 [20] presents the count of ABET-accredited programs under EAC in non-GCC Muslim-majority countries for 2025. The data reveals Turkey has the highest number of EAC-accredited bachelor's degree programs, followed by Jordan, Lebanon, and Egypt respectively.

Table 7. Number of EAC-evaluated ABET-accredited programs in non-GCC Muslim-majority countries (2025)

Countries	Associate	Bachelor's	Master's
Brunei Darussalam	0	1	0
Egypt	0	32	0
Indonesia	0	9	0
Jordan	0	56	0
Kazakhstan	0	0	0
Lebanon	0	46	0
Morocco	0	2	0
Palestine	0	10	0
Tunisia	0	4	0
Turkey	0	73	0
Total	0	233	0

Table 8 [20] displays the count of ABET-accredited programs under ETAC in non-GCC Muslim-majority countries for 2025. The data shows that Indonesia stands alone in having an ETAC-accredited associate degree program. Furthermore, no bachelor's or master's degree programs in these countries currently hold ETAC accreditation.

Table 8. Number of ETAC-evaluated ABET-accredited programs in non-GCC Muslim-majority countries (2025)

Countries	Associate	Bachelor's	Master's
Brunei Darussalam	0	0	0
Egypt	0	0	0
Indonesia	1	0	0
Jordan	0	0	0
Kazakhstan	0	0	0
Lebanon	0	0	0
Morocco	0	0	0
Palestine	0	0	0

Tunisia	0	0	0
Turkey	0	0	0
Total	1	0	0

Table 9 [20] presents data on historically ABET-accredited programs in non-GCC Muslim-majority countries as of 2025. While Turkey currently maintains approximately 6.6 times more ABET-accredited bachelor's degree programs than Indonesia, historical data reveals Indonesia holds the highest number of previously accredited bachelor's programs, with Turkey ranking second.

Table 9. Historically ABET-accredited programs in non-GCC Muslim-majority countries (2025)

Countries	Associate	Bachelor's	Master's
Brunei Darussalam	0	0	0
Egypt	0	0	0
Indonesia	0	21	0
Jordan	0	2	0
Kazakhstan	0	1	0
Lebanon	0	2	0
Morocco	0	0	0
Palestine	0	2	0
Tunisia	0	0	0
Turkey	0	8	0
Total	0	36	0

Table 10 [20] displays the count of higher education institutions with historically ABET-accredited programs in non-GCC Muslim-majority countries as of 2025. The data reveals that Jordan and Lebanon are tied with 2 institutions each offering historically accredited bachelor's degree programs. Similarly, Kazakhstan and Palestine each have 1 institution with historically ABET-accredited bachelor's programs.

Table 10. Institutions with historical ABET accreditation in non-GCC Muslim-majority countries (2025)

Countries	Associate	Bachelor's	Master's
Brunei Darussalam	0	0	0

Egypt	0	0	0
Indonesia	0	6	0
Jordan	0	2	0
Kazakhstan	0	1	0
Lebanon	0	2	0
Morocco	0	0	0
Palestine	0	1	0
Tunisia	0	0	0
Turkey	0	3	0
Total	0	15	0

Figure 1 illustrates the percentage of ABET-accredited programs in non-GCC Muslim-majority countries for 2025. The data reveals that Indonesia accounts for 100% of associate degree-level accreditations, as it is the sole country among the compared non-GCC Muslim-majority nations with ABET accreditation at this level. It should be noted, however, that this does not imply all eligible associate degree programs in Indonesia have received ABET accreditation.

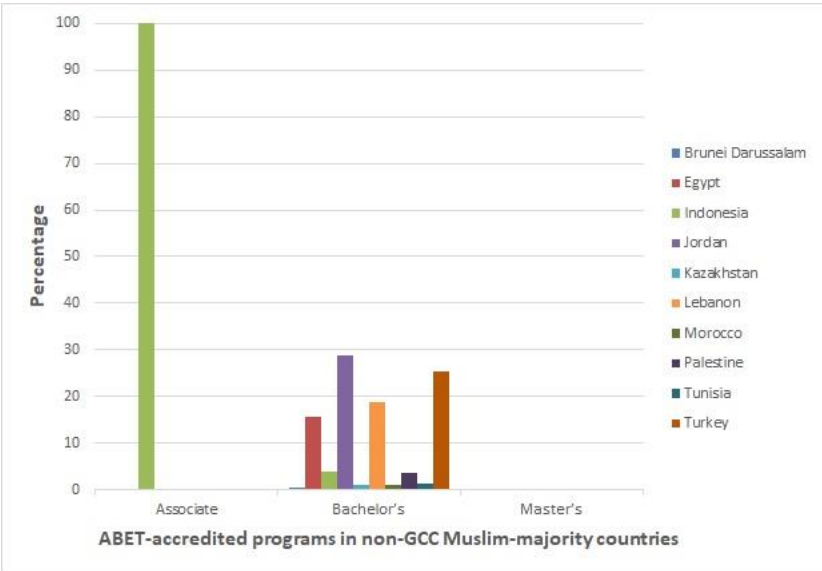


Figure 1. Percentage of ABET-accredited programs in non-GCC Muslim-majority countries (2025)

Figure 2 presents the percentage of historically ABET-accredited programs in non-GCC Muslim-majority countries as of 2025. The data indicates that only four nations—Brunei Darussalam, Egypt, Morocco, and Tunisia—have maintained continuous accreditation for all their ABET-accredited bachelor’s degree

programs. Notably, Brunei Darussalam, Morocco, and Tunisia have a limited number of such programs (1, 3, and 4, respectively). Additionally, Indonesia's sole ABET-accredited associate degree program remains active, having retained its accreditation status without lapse.

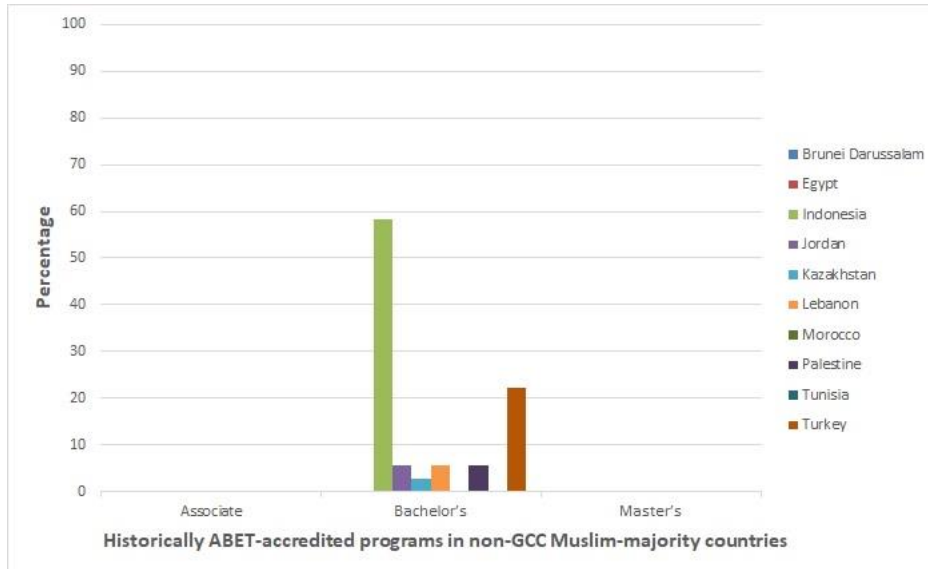


Figure 2. Percentage of historically ABET-accredited programs in non-GCC Muslim-majority countries (2025)

Conclusions

Ensuring inclusive, high-quality education and lifelong learning opportunities for all is essential. Accredited academic programs largely fulfill this need. This study is the first to examine all ABET-accredited programs across non-GCC Muslim-majority countries. Key findings include: Indonesia is the only country in this comparison with an ABET-accredited associate degree program. Over half (54.36%) of the ABET-accredited bachelor's programs are concentrated in Jordan (28.92%) and Turkey (25.44%). Additionally, 13.24% of these bachelor's programs in non-GCC Muslim-majority nations hold an international mutual recognition agreement (the Seoul Accord). Indonesia leads in historically ABET-accredited bachelor's programs (58.33%), followed by Turkey (22.22%). A limitation of this study is its focus solely on non-GCC Muslim-majority countries, but it could serve as a reference for other regions with ABET-accredited programs.

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References

1. SDGs, Available: <https://sdgs.un.org/> , Accessed on: 4 Apr. 2025.
2. A. Bilsel and E. Erdil, "Experience gained in applying ABET criteria to an electrical/electronic engineering program in a Turkish university", *Int. J. of Eng. Edu.*, vol. 20, no. 1, pp. 77-82, Jan. 2004.
<https://www.ijee.ie/articles/Vol20-1/IJEE1479.pdf>

3. JPT Staff, "Techbits: Education best practices discussed in Kazakhstan", *J. of Pet. Technol.*, vol. 62, no. 3, pp. 28-29, Mar. 2010.
<https://doi.org/10.2118/0310-0028-JPT>
4. B. Hussein, S. A.-Nabi, A. Harb, A. H.-Diab, and A. H.-Ali, "Curricula management and ABET alignment at the Lebanese international university school of engineering", *J. of Edu. and Practice*, vol. 5, no. 22, pp. 163-168, July 2014.
<https://iiste.org/Journals/index.php/JEP/article/view/14554>
5. F. Gul and S. B. Duraman, "Engineering and technical education in Brunei Darussalam: Current status and future development", in *Proc. of the 5th Brunei Int. Conf. on Eng. and Technol. (BICET 2014)*, Bandar Seri Begawan, Brunei Darussalam, pp. 1-7, Nov. 2014.
<https://doi.org/10.1049/cp.2014.1102>
6. W. Wulandari, J. Sitompul, and I. D. G. A. Putrawan, "Chemical engineering ITB for ABET reaccreditation: Towards continuous quality improvement and innovation in education", in *Proc. of the Int. Seminar on Chemical Eng. in conjunction with Seminar Teknik Kimia Soehadi Reksowardojo (STKSR 2016)*, Bandung, Indonesia, pp. 513-523, Oct. 2016.
http://repository.lppm.unila.ac.id/2709/1/Proceeding_of_International_Seminar_ChE-Udin.pdf
7. A. Khelifi, S. Khelifi, N. Khelifi, and E. Hamdi, "A proposal for a national frame of reference for the accreditation of engineering programs in Tunisia", *Quality Assurance in Edu.*, vol. 28, no. 4, pp. 255-275, Aug. 2020.
<https://doi.org/10.1108/QAE-02-2020-0013>
8. D. M. A. Hawash, "The extent of conformity of academic programs outcomes at the college of engineering, the university of Jordan to ABET standards from the viewpoint of faculty members and quality assurance representatives", *The Arab J. for Quality Assurance in Higher Edu.*, vol. 13, no. 44, pp. 55-78, Nov. 2020.
<https://doi.org/10.20428/ajgahe.v13i44.1687>
9. A. Algieri, G. Lombara, J. Perez, R. Zmich, and T. Ourdyl, "Assisting the international university of Rabat in attaining ABET accreditation", *Bach. of Sci. Proj. Rep.*, Worcester Polytechnic Institute, Worcester, MA, USA, pp. 1-74, Mar. 2021.
https://digital.wpi.edu/concern/student_works/zw12z807j?locale=en
10. O. Marzouk, "Status of ABET accreditation in the Arab world", *Global J. of Edu. Studies*, vol. 5, no. 1, pp. 1-10, Oct. 2021.
<https://ssrn.com/abstract=3920108>
11. B. J. Putman, K. A. Al-Sahili, A. Khader, and A. Gilbrecht, "Assessing ABET student outcomes through international virtual exchange", in *Proc. of the 2024 ASEE Annual Conf. & Expo.*, Portland, OR, USA, pp. 1-22, June 2024.
<https://doi.org/10.18260/1-2--46601>
12. M. M. U. Faiz and M. S. Almutairi, "Engineering education for a resilient society: A case study of the Kingdom of Saudi Arabia", in *Proc. of the 2015 World Eng. Edu. Forum (WEEF 2015)/the 18th IEEE Int. Conf. on Interactive Collaborative Learning (ICL 2015)*, Florence, Italy, pp. 82-88, Sep. 2015.
<https://doi.org/10.1109/ICL.2015.7317983>

13. M. M. U. Faiz and M. S. Almutairi, "On the ABET accreditation of academic programs and rankings of universities in Saudi Arabia", in *Proc. of the 2021 World Eng. Edu. Forum/Global Eng. Deans Council (WEEF/GEDC 2021)*, Madrid, Spain, pp. 270-276, Nov. 2021.
<https://doi.org/10.1109/WEEF/GEDC53299.2021.9657262>
14. M. M. U. Faiz, U. B. Mansoor, S. M. Asad, and K. Mahmood, "Using faculty course assessment report for the assessment of an associate degree course in engineering technology program", in *Proc. of the 6th IEEE Int. Conf. on Eng. Edu. (ICEED 2014)*, Kuala Lumpur, Malaysia, pp. 73-78, Dec. 2014.
<https://doi.org/10.1109/ICEED.2014.7194691>
15. M. M. U. Faiz and M. S. Almutairi, "Assessment of a cooperative training course using faculty course assessment report in an ABET accredited engineering technology program", in *Proc. of the 45th ASEE/IEEE Front. Edu. Int. Conf. (FIE 2015)*, El Paso, TX, USA, pp. 1-7, Oct. 2015.
<https://doi.org/10.1109/FIE.2015.7344403>
16. M. M. U. Faiz and M. S. Almutairi, "Assessment of student outcomes of an electrical and electronics engineering technology programme: A case study", *Global J. of Eng. Edu.*, vol. 23, no. 3, pp. 231-239, Oct. 2021.
<http://www.wiete.com.au/journals/GJEE/Publish/vol23no3/10-Faiz-M.pdf>
17. M. M. U. Faiz and M. S. Almutairi, "Curricula comparison of electrical and electronics engineering technology and similarly named associate degree programmes", *World Trans. on Eng. and Technol. Edu.*, vol. 19, no. 4, pp. 384-391, Nov. 2021.
[http://www.wiete.com.au/journals/WTE&TE/Pages/Vol.%2019,%20No.4%20\(2021\)/07-Faiz-M.pdf](http://www.wiete.com.au/journals/WTE&TE/Pages/Vol.%2019,%20No.4%20(2021)/07-Faiz-M.pdf)
18. M. M. U. Faiz, "Curricula comparison of mechanical engineering technology and similarly named programmes", *World Trans. on Eng. and Technol. Edu.*, vol. 21, no. 1, pp. 32-37, Feb. 2023.
[http://www.wiete.com.au/journals/WTE&TE/Pages/Vol.%2021,%20No.1%20\(2023\)/05-Faiz-M.pdf](http://www.wiete.com.au/journals/WTE&TE/Pages/Vol.%2021,%20No.1%20(2023)/05-Faiz-M.pdf)
19. M. M. U. Faiz, S. K. Oruganti, and G. Khokare, "A comparative analysis of ABET accredited programs in the GCC countries", *SPAST Reports*, vol. 1, no. 1, pp. 1-8, Feb. 2025.
<https://spast.org/techrep/article/view/5231>
20. ABET, Available: <https://amspub.abet.org/aps/name-search?searchType=institution> Accessed on: 1 May 2025.