Prof. Dr. Abdul Waheed Bhutto

Professor & Pro Vice Chancellor,
Dawood University of Engineering and Technology (DUET)
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Achievements

Prof. Dr. Abdul Waheed Bhutto is a distinguished academician and researcher, serving as Pro Vice Chancellor at Dawood University of Engineering and Technology. He has authored numerous publications and secured significant research grants, notably in the field of sustainable energy, renewable resources, and biomass utilization. He established the Biomass Conversion and Green Chemicals Recovery Technology laboratory, received Research Productivity Awards, and contributed extensively to academia and collaborations in higher education. Prof. Bhutto's expertise and leadership have garnered recognition and contributed to advancements in the field..

Professional Memberships

1. Life Member, Pakistan Engineering Council.
2. Professional Member, American Institute of Chemical Engineers (AIChE), International
3. Professional Member, American Chemical Society (ACS), International.
4. Member South Asia Network for Development Environmental Economist (SANDEE).
5. Member, Productive Scientists of Pakistan (PSP) Directory-2017 by Pakistan Council for Science and Technology
6. Member, Productive Scientists of Pakistan (PSP) Directory-2016 by Pakistan Council for Science and Technology (PCST), Islamabad.

Achievements and Awards

1. Research Productivity Award (RPA) 2015 from Pakistan Council for Science and Technology (PCST), Islamabad.
2. Research Productivity Award (RPA) 2014 from PCST, Islamabad
3. Research Productivity Award (RPA) 2013 from PCST, Islamabad.
4. Research Productivity Award (RPA) 2012 from PCST, Islamabad.

Recent Trainings and Courses

1. Participated in Three Day **Leadership Workshop for Vice Chancellors/Pro Vice Chancellors** organized by Sindh HEC.
2. Participated in Two Day **Capacity Building Workshop for Vice Chancellors/Pro Vice Chancellors** organized by Sindh HEC.
3. Attended online training on "**Research Data Management-Why It Matters and How to Manage**" by Elsevier Asia Pacific on Thursday 14 July 2022.
4. Participated in **'HEC-BC Research Capacity Building Program' held at Avari Tower Hotel, Karachi from 23rd-27th May 2022.**
5. Successfully completed online module "**Successful Research Grant Applications – getting it right**" by Elsevier Researcher Academy on Sunday 13 March 2022.
6. Successfully completed online module "**Plagiarism**" by Elsevier Researcher Academy on Monday 28 February 2022.

Research Initiatives

Founder Member of Biomass Conversion Research Center with objective to unify Pakistan's efforts to advance technology for producing fuels, chemicals, materials, and power from biomass. BCRC is a collaborative effort between DCET, COMSATS Institute of Information Technology (CIIT), Mehran University of Engineering and Technology and Ebrahim Jamal Research (HEJ) Institute of Chemistry. Further details are available at group's official website (http://research.ciitlahore.edu.pk/Groups/BCRC/index.html)

Established **"Biomass Conversion and Green chemicals Recovery Technology laboratory"** at Dawood University of Engineering and Technology, Karachi. < https://duet.edu.pk/biomass-conversion-and-green-chemicals-recovery-technology-laboratory/)

Research Funding

1. **Abdul Waheed Bhutto** (PI)/ Dr. Aqeel Ahmed Bazmi (CoPI). "Study to explore the viable strategy for commercial production of petrochemical precursors from lignocellulosic biomass, under National Research Program for Universities- NRPU- Higher Education Commission of Pakistan, **2022**. (**Rs. 6.86 million**).
2. Dr. **Abdul Waheed Bhutto** (PI), "**Potential to utilize Lignocellulosic Feedstock for the production of Ethanol Fuel in Pakistan**" ORIC-DUET **2019** (PKR 0.5 million).
3. Dr. Muhammad Shahab Alam (PI) / **Abdul Waheed Bhutto** (CoPI), "Combinatorial synthesis of ionic liquids & study of their physical properties" Higher Education Commission of Pakistan **2012** (PKR 0.5 million).

Patent

Saad Nawaz, Khadija Qurashi, Rao Shakeel Ahmad, Kashif Sagheer, Zeeshan Nawaz and Abdul Waleed Bhutto. 2017. *In-situ Heated System of Open Top Evaporator for Industrial Wastewater Minimization*. **IPO-Pakistan- 142973**

Assignments as Reviewer (2016-2023)

1. Wires Climate Change. (John Wiley & Sons Publications, Impact Factor: 4.571)
2. Utilities Policy (Elsevier Publication, Impact Factor: 0.892)
3. Renewable & Sustainable Energy Reviews (Elsevier Publication, Impact Factor: 16.79)
4. International Jr of Mining Science and Technology (Elsevier Publication-Impact Factor: 7.67)
5. Clean Technologies and Environmental Policy (Springer Publication, Impact Factor: 4.7)
6. Environmental Progress & Sustainable Energy (Wiley & Sons Publication, Impact Factor: 2.8
7. Reviews in Chemical Engineering (Walter de Gruyter GmbH Publication, Impact Factor: 8.7)
8. Waste and Biomass Valorization (Springer Publication, Impact Factor: 3.44)
9. Biofuels, Bioproducts and Biorefining (John Wiley & Sons Publication, Impact Factor: 5.2)
10. Journal of Cleaner Production (Elsevier Publication, Impact Factor: 11.0)
11. Energy & fuels (ACS Publication, Impact Factor: 4.6)
12. International Journal of Coal Science & Technology (Springer Publication)
13. Chemical Engineering Research and Design (Elsevier Publication, Impact Factor: 4.119)

Publications in HEC Recognized Journals

1. Jarwar, A. I., A. Q. Laghari, G. Maitlo, K. Qureshi, **A. W. Bhutto,** A. K. Shah, A. S. Jatoi and S. Ahmed **(2021).** Biological assisted treatment of buffalo dung and poultry manure for biogas generation using laboratory-scale bioreactor. Biomass Conversion and Biorefinery. doi.org/10.1007/s13399-020-01248-1.

2. Saulat, H., M. M. Khan, M. Aslam, M. Chawla, S. Rafiq, F. Zafar, M. M. Khan, A. Bokhari, F. Jamil, **A. W. Bhutto** and A. A. Bazmi (**2020**). "Wind speed pattern data and wind energy potential in Pakistan: current status, challenging platforms and innovative prospects." Environmental Science and Pollution Research. doi.org/10.1007/s11356-020-10869-y.

3. Mazari, S. A., R. Abro, **A. W. Bhutto,** I. M. Saeed, B. S. Ali, B. M. Jan, L. Ghalib, M. Ahmed and N. M. Mubarak (**2020**). "Thermal degradation kinetics of morpholine for carbon dioxide capture." Journal of Environmental Chemical Engineering 8(3): 103814. doi.org/10.1016/j.jece.2020.103814.

4. **Bhutto, A.W.,** Bazmi, A.A., Karim, S., Abro, R. Mazari, S. A., Nizamuddin, S. (**2019**). Promoting sustainability of use of biomass as energy resource: Pakistan's perspective. Environmental Science and Pollution Research. **26 (29):** 29606–29619. doi.org/10.1007/s11356-019-06179-7.

5. Kiran, N., Abro, R. Abro, M., Shah, A.A., Jatoi, A.S., **Bhutto, A.W.,** Qureshi, K., Sabzoi, N., Gao, S., Yu, G. (**2019**). Extractive desulfurization of gasoline using binary solvent of bronsted-based ionic liquids and non-volatile organic compound. Chemical Papers. **73(11):** 2757–2765. doi.org/10.1007/s11696-019-00828-4.

6. Siddiqui, M.T.H, Nizamuddin, S., Baloch, H. A, Mubarak, N.M., Al-Alia, M., Mazari, S. A., **Bhutto, A.W.**, Abro, R., Srinivasana, M., Griffin, G. (**2019**). Fabrication of advance magnetic carbon nano-materials and their potential applications: A review." Journal of Environmental Chemical Engineering 7(1): 102812. doi.org/10.1016/j.jece.2018.102812

7. Nizamuddin, S., Baloch, H.A., Siddiqui, M.T.H., Mubarak, N. M., Tunio, M. M., **Bhutto, A. W.,** Jatoi, A.S., Griffin, G. J., Srinivasan, M. P. (**2018**). An overview of microwave hydrothermal carbonization and microwave pyrolysis of biomass. Rev Environ Sci Biotechnol. 17 (4): 813–837. doi.org/10.1007/s11157-018-9476-z
8. Siddiqui, M.T.H., Nizamuddin, S., Baloch, H. A., Mubarak, Dumbre, D. K., Inamuddin, Asiri, A. M., **Bhutto, A. W.,** Srinivasan, M., Griffin, G. J. **(2018).** Synthesis of magnetic carbon nanocomposites by hydrothermal carbonization and pyrolysis. Environmental Chemistry Letters. doi.org/10.1007/s10311-018-0724-9

9. Nizamuddin, S., Baloch, H. A., Mubarak, N. M., Raiz, S., Siddiqui**,** M.T.H., Takkalkar, P., Tunio, M.M., Mazari, S., **Bhutto, A. W. (2018).** Solvothermal Liquefaction of Corn Stalk: Physico-Chemical Properties of Bio-oil and Biochar. Waste and Biomass Valorization**.** doi.org/10.1007/s12649-018-0206-0

10. Shah, A. K., Park, S., Khan, H. A., Bhatti, U. H., Kumar, P., **Bhutto, A.W.,** Park, Y. H. **(2018).** Citronellal cyclisation over heteropoly acid supported on modified montmorillonite catalyst: effects of acidity and pore structure on catalytic activity. Research on Chemical Intermediates. 44 (4) : 2405–2423. doi.org/10.1007/s11164-017-3237-4

11. **Bhutto, A. W.,** Bazmi, A.A., Qureshi, K., Harijan, K., Karim, S., and Ahmad, M.S. (2017). Forecasting the Consumption of Gasoline in Transport Sector in Pakistan Based on ARIMA Model. Environmental Progress & Sustainable Energy. 36(5): 1490-1497**.** doi.org/10.1002/ep.12593

12. Nizamuddin, S., Baloch, H. A., Griffin, G. J., Mubarak, N. M., **Bhutto, A. W.,** Abro, R., Mazari, S. A., and Ali, B. S. (2017). An overview of effect of process parameters on hydrothermal carbonization of biomass. Renewable and Sustainable Energy Reviews. 73: 1289–1299. doi.org/10.1016/j.rser.2016.12.122

13. **Bhutto, A. W.,** Qureshi, K., Harijan, K., Abro, R., Abbas, T., Bazmi, A.A., Karim, S., and Yu. G. (2017). Insight into progress in pre-treatment of lignocellulosic biomass. Energy. 122: 724–745. doi: 10.1016/j.energy.2017.01.005

14. Abro, R., M. Abro, S. Gao, **A. W. Bhutto,** Z. M. Ali, A. Shah, X. C. Yu and Guangren (2016). "Extractive Denitrogenation of Fuel using Ionic Liquids: Review." RSC Advances. 6: 93932-93946. DOI: 10.1039/C6RA09370A

15. Bhatti, I., Qureshi, K., Kamarudin, K.S.N., Bazmi, A. A., Ahmad, F., **Bhutto, A. W.** and Lee, M. (2016). Innovative method to prepare a stable emulsion liquid membrane for high CO2 absorption and its performance evaluation for a natural gas feed in a rotating disk contactor. Journal of Natural Gas Science & Engineering. 34: 716–732. doi: 10.1016/j.jngse.2016.07.013

16. Baloch, H. A., Sun, Y., Sun, H. Lia, J., Kou, Z., Li, R., Yang, T. and **Bhutto, A. W.** (2016). Parametric study of pyrolysis and steam gasification of rice straw in presence of K2CO3. Korean Journal of Chemical Engineering. 33: 2567–2574. doi: 10.1007/s11814-016-0121-7.

17. Bhatti, I., **Bhutto, A. W.,** Qureshi, K., Kamarudin, K.S.N., Bazmi, A. A., Ahmad, F. (2016). Hydrodynamics study of modified rotating disc contactor for CO2 absorption from natural gas using emulsion liquid membrane. Chemical Engineering Research and Design. 111: 465–478. doi:10.1016/j.cherd.2016.05.029

18. Zheng ZHAO, Na LI, **Bhutto, A. W.,** Ahmed A. ABDELTAWAB, Salem S.AL-DEYAB , Guangqing LIU, Xiaochun CHEN, Guangren YU. (2016). N-methyl-2-pyrrolidonium-based Brönsted-Lewis acidic ionic liquids as catalysts for the hydrolysis of cellulose. Science China Chemistry. 59 (5): 564-570. doi: 10.1007/s11426-016-5592-1

19. Baloch, H. A., Yang, T., Li, R., Sun., Nizamuddin, S., H., Kai, X., and **Bhutto, A. W.** (2016). Parametric study of co-gasification of ternary blends of rice straw, polyethylene and polyvinylchloride. Clean Technologies and Environmental Policy. First online: 23 January 2016. doi:10.1007/s10098-016-1092-4

20. **Bhutto, A.W.,** Abro, R., Gao, S., Abbas, T., Chen, X., and Yu, G. (2016). Oxidative Desulphurization of Fuel Oils Using Ionic Liquids: A Review. Journal of the Taiwan Institute of Chemical Engineers. doi:10.1016/j.jtice.2016.01.014

21. **Bhutto, A. W.,** Qureshi, K., Abro, R., Harijan, K., Zhao, Z., Bazmi A. A., Abbas, T., and Yu, G. (2016). Progress in production of biomass-to-liquid biofuels to decarbonize transport sector-Prospectus and challenges. RSC Advances 6, 32140-32170. doi:10.1039/C5RA26459F

22. Ahmad, M. S., Bazmi, A. A., **Bhutto, A. W.,** Shahzadi, K., and Bukhari, N. (2016). "Students' Responses to Improve Environmental Sustainability through Recycling: Quantitatively Improving Qualitative Model." Applied Research in Quality of Life: Volume 11 (1): 253-270. doi: 10.1007/s11482-014-9366-7

23. **Bhutto, A. W.,** K. Harijan, K. Qureshi, A. A. Bazmi and Bahadori, A. (2015). "Perspectives for the production of ethanol from lignocellulosic feedstock-A case study." Journal of Cleaner Production: Volume 95: 184–193. doi:10.1016/j.jclepro.2015.02.091

24. Nizamuddin, S., N. S. Jayakumar, J. N. Sahu, P. Ganesan, **Bhutto, A. W.** and N. M. Mubarak (2015). "Hydrothermal carbonization of oil palm shell." Korean Journal of Chemical Engineering. Volume 32 (9): 1789-1797 doi:10.1007/s11814-014-0376-9

25. Abbas, T., A. A. Bazmi, **Bhutto, A. W.,** and G. Zahedi (2014). "Greener energy: Issues and challenges for Pakistan-geothermal energy prospective." Renewable and Sustainable Energy Reviews 31: 258-269. doi:10.1016/j.rser.2013.11.043

26. **Bhutto, A.W.,** Bazmi, A. A., Zahedi, G, and Klemeš, J.J. (2014). "A Review of Progress in Renewable Energy Implementation in the Gulf Cooperation Council Countries." Journal of Cleaner Production. Volume 71: 168–180. doi:10.1016/j.jclepro.2013.12.073.

27. **Bhutto, A. W.,** K. Quraishi, K. Harijan, G. Zahedi and A. Bahadori (2014). "Strategy for consolidation of biologically mediated events in conversion of pre-treated lignocellulose into ethanol." RSC Advances 4: 3392-3412. doi: 10.1039/C3RA44020F

28. **Bhutto, A. W.,** A. A. Bazmi and G. Zahedi (2013). "Greener energy: Issues and challenges for Pakistan—wind power prospective." Renewable and Sustainable Energy Reviews 20: 519-538. doi:10.1016/j.rser.2012.12.010

29. **Bhutto, A. W.,** A. A. Bazmi and G. Zahedi (2013). "Underground coal gasification: From fundamentals to applications." Progress in Energy and Combustion Science 39(1): 189-214. doi:10.1016/j.pecs.2012.09.004

30. **Bhutto, A. W.,** A. A. Bazmi and G. Zahedi (2012). "Greener energy: Issues and challenges for Pakistan—hydel power prospective." Renewable and Sustainable Energy Reviews 16(5): 2732-2746. doi:10.1016/j.rser.2012.02.034

31. **Bhutto, A. W.,** A. A. Bazmi and G. Zahedi (2012). "Greener energy: issues and challenges for Pakistan—solar energy prospective." Renewable and Sustainable Energy Reviews 16(5): 2762-2780. doi:10.1016/j.rser.2012.02.043

32. **Bhutto, A. W.,** A. A. Bazmi and G. Zahedi (2011). "Greener energy: Issues and challenges for Pakistan—Biomass energy prospective." Renewable and Sustainable Energy Reviews 15(6): 3207-3219. doi:10.1016/j.rser.2011.04.015

33. Bhutto, A. W. and A. A. Bazmi (2007). "Sustainable agriculture and eradication of rural poverty in Pakistan." Natural Resources Forum 31(4): 253-262. doi: 10.1111/j.1477-8947.2007.00162.x

34. **Bhutto, A. W.** and S. Karim (2007). "Energy-poverty alleviation in Pakistan through use of indigenous energy resources." Energy for sustainable development 11(1): 58-67. doi:10.1016/S0973-0826(08)60564-5

35. **Bhutto, A. W.,** S. Karim, A. A. Bazmi and N. A. Pathan (2007). "Biochemical engineering education in Pakistan." Journal of Chemical Engineering of Japan 40(12): 1121-1128. doi.org/10.1252/jcej.07WE056

36. **Bhutto, A.W.** (2005). "Enhancing chemical engineering curricula in Pakistan to adapt to the new challenges of industrialization." World Transactions on Engineering and Technology Education. 4(2): 239-244.

37. **Bhutto, A. W.** and S. Karim (2005). "Coal gasification for sustainable development of the energy sector in Pakistan." Energy for Sustainable Development 9(4): 60-67. doi:10.1016/S0973-0826(08)60500-1

Book Chapter Publication

38. **Bhutto, A. W.,** Yu, G., Abro, R. (2016). Desulphurization of Fuel Oils Using Ionic Liquids in Petrochemical Materials, Processes, and Emerging Technologies. doi: 10.4018/978-1-4666-9975-5.ch010. IGI Global, Hershey, PA 17033, USA

39. Gholamreza Zahedi, A. A. Bazmi., **Bhutto, A.W.** (2012). The Environmental Impacts in Industrialization. Advances in Environmental Research. Nova Science Publishers. 20: 147-162.

Publication in Conferences/ Workshops Proceedings

40. Bhutto, A W., Yaseen, M. 2010. **Overcoming the energy efficiency gap in Pakistan's household sector**. Paper published in the Processing of International conference on energy systems engineering (ICESE-2010) Islamabad, Pakistan held on October 25 - 27, 2010. (Paper #23), organized by National University of Sciences and Technology (NUST), Islamabad, Pakistan

41. Bhutto, A. W., and Karim, S. 2007. **Natural gas resources expansion in Pakistan and energy security.** Paper published in the Proceeding of Second International Conference: Environmentally Sustainable Development (26-28 August 2007) organized by COMSATS Institute of Information Technology, Abbottabad, Pakistan.

42. Bhutto, A. W., Bazmi A. A., and Ghauri, M. 2007. **Fuel ethanol as feasible and desired option in Pakistan.** Paper published in the Proceeding of Second International Conference: Environmentally Sustainable Development (26-28 August 2007) organized by COMSATS Institute of Information Technology, Abbottabad, Pakistan.

43. Bhutto, A. W., and Bazmi A. A. 2005. "**Assessment of Sludge and Tank bottoms Treatment Processes"**, Paper published in the Proceeding of First International Conference: Environmentally Sustainable Development (26-28 June 2005.) organized by COMSATS Institute of Information Technology, Abbottabad, Pakistan (2005) pp 1797-1803.

Symposium Chair

1. Symposium on **"Expanding Frontier and Advancing Environs of Chemical Engineering in Pakistan"** held on Sept 17, 2016 at Pearl Continental Hotel, Karachi organized by department of Chemical Engineering, Dawood University of Engineering and Technology, Karachi

Keynote Speeches in Conferences

1. **Modern energy applications of biomass to improve energy services in Pakistan.** Keynote Speech in the "Energy Systems for Sustainable Development (ESSD-2017)" held on February 21-23, 2018 at Department of Chemical Engineering, COMSATS Institute of Information Technology, Lahore Pakistan

2. **Promotion of modern applications of biomass energy for cooking and heating purpose in household sector in Pakistan.** Keynote Speech in the 3rd Conference on Emerging Materials and Processes (CEMP 2017) held on November 13th-14th, 2017 at School of Chemical and Materials Engineering (SCME), NUST, Islamabad.

3. **Innovative method to prepare a stable emulsion liquid membrane for high CO_2 absorption and its performance evaluation for a natural gas**. Keynote Speech in the 1st International Conference on Advanced Materials & Processing 2017 (ICAMP-17) held on February 28-March 01, 2017 at Mehran University of Engineering and Technology, Jamshoro, Pakistan.

4. **Potential to utilize lignocellulosic feedstock to produce Ethanol Fuel in Pakistan**. Keynote Speech in the 4th International Conference on Energy, Environment and Sustainable Development (EESD) held on Nov. 01- 03, 2016 at Mehran University of Engineering and Technology (MUET), Jamshoro.

5. **Greener Energy: Issues and Challenges for Pakistan-Biomass Energy Prospective**. Keynote Speech in the 3rd Conference on Sustainability in Process Industry (SPI-2016) held on 19-20th October 2016 at University of Engineering and Technology, Peshawar.

Achievements of Prof Dr Abdul Waheed Bhutto

Research Profile

1. **Prof Dr Abdul Waheed Bhutto is currently working Professor and** P**ro Vice Chancellor** at Dawood University of Engineering and Technology, Karachi. He has done his PhD on Modelling production of liquid fuels from Biomass from Mehran University of Engineering and Technology, Jamshoro. He successfully modelled the adoption of biomass-based ethanol as blending component of gasoline in Pakistan. He has also worked on increasing the performance and efficiency of biomass-based energy devices and appliances.
2. He established "Biomass Conversion and Green chemicals Recovery Technology laboratory" at Dawood University of Engineering and Technology, Karachi. < https://duet.edu.pk/biomass-conversion-and-green-chemicals-recovery-technology-laboratory/) to focus on biomass conversion and applications.
3. He is currently supervising MS and PhD students in renewable energy, green chemistry, and sustainable development.
4. As Principal Investigator, he has been awarded with The National Research Program for Universities (NRPU) grant awards (2021-2022), Higher Education Commission of Pakistan, amounting Rs**. 6.86 million** i**n 2022** to "Explore the viable strategy for commercial production of petrochemical precursors from lignocellulosic biomass".
5. Web of Science has credited him for *45 publications (including 33 Publications from the Web of Science Core Collection) with 1598 citation and H-Index of 20 and verified reviews 29 (https://www.webofscience.com/wos/author/record/869700)/ and https://orcid.org/0000-0002-3774-2214*.
6. His Google Scholar research credentials are as under

Citations		
Citations	2784	2251
h-index	23	23
i10-index	34	31

7. *He is also reviewer of Textbook & Monograph Writing Scheme (TMWS) of HEC.*
8. *He is Reviewer of many ISI indexes international journals. The list includes.*
    1. Wires Climate Change (John Wiley & Sons Publications, Impact Factor: 10.07)
    2. Utilities Policy (Elsevier Publication, Impact Factor: 3.247)
    3. Renewable & Sustainable Energy Reviews (Elsevier Publication, Impact Factor: 5.901)
    4. International Journal of Mining Science and Technology (Elsevier Publication)
    5. Clean Technologies and Environmental Policy (Springer Publication, Impact Factor: 1.934)
    6. Environmental Progress & Sustainable Energy (Wiley & Sons Publication, Impact Factor: 1.403)
    7. Reviews in Chemical Engineering (Walter de Gruyter GmbH Publication, Impact Factor: 2.41)
    8. Waste and Biomass Valorization (Springer Publication, Impact Factor: 2.851)

9. Biofuels, Bioproducts and Biorefining (John Wiley & Sons Publication, Impact Factor: 4.528)
10. Journal of Cleaner Production (Elsevier Publication, Impact Factor: 7.24)
11. Energy & fuels (ACS Publication, Impact Factor: 3.24)
12. International Journal of Coal Science & Technology (Springer Publication)
13. Petroleum Science and Technology (0.33
14. International Journal of Coal Science & Technology
15. Energy Sources Part B-Economics Planning and Policy
16. Energy & fuels.
17. Mitigation and Adaptation Strategies for Global Change

9. *He has won Research Productivity Award (RPA)* from Pakistan Council for Science and Technology (PCST) from 2012 to 2016.
10. *He was in list of Productive Scientists of Pakistan (PSP)* published by Pakistan Council for Science and Technology since 2012 up to 2020.
11. *He has delivered Keynote speeches* in significant number of international and national Conferences/workshops/seminars.

Academic Profile as Dean and Pro Vice Chancellor, DUET

1. He is instrumental in increasing University own resources from 10 % in FY 2020-21 to 30% in FY 2022-23. He is also instrumental in developing system for online fee collection from students.

2. His initiatives of starting new BS./MS/PhD programs have increased University intake strength from 500 students in undergraduate programs only in 2016 to 1050 in undergraduates' programs and 150 in MS/PhD program for year 2022.

3. He is instrumental in regularly organizing the meeting of statutory bodies of university that include Advanced Studies and Research Board, Academic Council, Syndicate and Senate.

4. Leading Compliance committee for academic standards for implementation of HEC policies and stablishing research laboratories.

5. Leading the team to oversee image of the university, implement university's growth strategies, and make initiatives to raise visibility, promote community engagement, integration and outreach and develop sustainable and cordial relationship with corporate sector.

6. He was the convener of committee for the hiring of consulting firm for Design, Drawing and Detailed Supervision of building to be constructed under the PC-I.

7. Participated in Capacity Building Workshop for Vice Chancellors/Pro Vice Chancellors
8. As chief Organizer successfully organized Eight Convocations of University
9. As chief Organizer, Organized 06 international conferences/workshops.
10. As convener of Admission committee successfully *supervised Undergraduate and postgraduate admissions for 2020-2022.*

11. As convenor of prospectus committee published University Prospectus from last eight years.

12. He headed the academic team to start BS programs in Computer Sciences, Cyber Security, Artificial Intelligence, Business Information Systems and Mathematics in DUET to take maximum utilizations the resources.

13. He headed the academic team to take the NOC from HEC and started for first time started postgraduate programs in university. Currently University is offering following MS and PhD programs. All these programs were started after taking NOC from HEC.

    PhD Programs

    1. Chemical Engineering
    2. Computer System Engineering
    3. Electronics Engineering
    4. Industrial Engineering
    5. Metallurgy and Materials Engineering

    MS Programs

    1. Chemical Engineering
    2. Computer System Engineering
    3. Electronics Engineering
    4. Industrial Engineering
    5. Metallurgy and Materials Engineering
    6. Chemistry
    7. Mathematics

14. He was instrumental in introducing Outcome based education (OBE) in Dawood University. He organized significant numbers of workshops and training for the faculty inviting local as well as foreign experts to training University Faculty. He initiates help two department in secured level-II accreditation from PEC while other departments are also expected to secured Level-II accreditation from PEC.

Chairperson of Chemical Engineering Department

15. He was appointed as Assistant Professor, Department of Chemical Engineering, DCET, Karachi 2004. When he was appointed as Assistant Professor, Department was facing accreditation problem because of shortage of Laboratories. He was instrumental in establishing five new Laboratories in Department of Chemical Engineering to address the PEC concerns.

16. In 2010 he was assigned additional charge of Chairperson, Department of Chemical Engineering, DUET. In his capacity of chairperson, department regularly organized seminars and workshops including Symposium on "Expanding Frontier and Advancing Environs of Chemical Engineering in Pakistan" held on Sept 17, 2016, at Pearl Continental Hotel, Karachi.

17. He successful accredited his BE (Chemical Engineering) program from PEC.

18. He has been the member of Member National Curriculum Revision Committee (NCRC) in Chemical Engineering, Higher Education Commission, Government of Pakistan. (2007 - 2019).