### Dr. Abdulaziz Eid Alfadhli

# Assistant Professor of Automotive and Marine Engineering Technology

#### **Education:**

- 2001, B.Sc., Kuwait University, Mechanical Engineering, Kuwait.
- 2005, M.Sc., Kuwait University, Mechanical Engineering, Kuwait.
- 2011, M.Sc., Leeds University, Mechanical Engineering, United Kingdom (UK).
- 2018, Ph.D., University of Bath, Mechanical Engineering, United Kingdom (UK).

### Number of years of service on this faculty:

Seven Years

- 2011-2014 Assistant Instructor, Faculty of Technological Studies, PAAET, Kuwait.
- 2018 Present Assistant Professor, Faculty of Technological Studies, PAAET, Kuwait.

## Other related experience:

2001 to 2004, Laboratory, Mechanical Engineering Dept., Kuwait University, Kuwait 2005 to 2010, Teaching Assistant, Mechanical Engineering Dept., Kuwait University, Kuwait.

#### **Teaching interests:**

Engineering Graphics, Dynamics, System Dynamics, Mechanical Vibrations, Mechanical Design I and II, Modern Control Systems, Optimal design, Thermodynamics, Mathematics, Static, Linear Algebra, Solid Mechanics and Fluid Mechanics.

## Courses taught at PAAET:

Thermodynamics, Gasoline fuel injection systems, Engineering drawing, Automotive mechanics.

### **Research interests:**

- 1) Active and semi-active suspension systems.
- 2) Adaptive and suspension optimization parameters.
- 3) Vibration effects on human health and comfort.
- 4) Vibrations of rotary dynamics.
- 5) Vibration control.

# Principal publications of last five years:

- Emad Khorshid, Abdulaziz Alfadli, Abdulazim Falah, (2018) "Application of constraint infeasibility detection methods in engineering design problems", Journal of Engineering, Design and Technology, Vol. 16 Issue: 2, pp.285-312, https://doi.org/10.1108/JEDT-03-2017-0026.
- A. Alfadhli, J. Darling, A.J. Hillis, the Control of an Active Seat Suspension Using an Optimised Fuzzy Logic Controller, Based on Preview Information from a Full Vehicle Model, Vibration. 1 2018, 3. doi: 10.3390/vibration1010003.
- Alfadhli A, Darling J, Hillis AJ. An Active Seat Controller with Vehicle Suspension Feedforward and Feedback States: An Experimental Study. Appl Sci; 8. Epub ahead of print 2018. DOI: 10.3390/app8040603.
- 4. Alfadhli A, Darling J and Hillis AJ (2017) The control of an active seat with vehicle suspension preview information. Journal of Vibration and Control: 1–15.
- 5. Khorshid, E., Alfadli, A., & Majeed, M. (2010). A new optimal Arabic keyboard layout using genetic algorithm. International Journal of Design Engineering, 3(1), 25-40.

 Darling J, Hillis A, Alfadhli AEHE, et al. (2016) Hardware-in-the-Loop (HIL) Simulation of a Quarter Vehicle Model using a Multi-axis Simulation Table (MAST). In: Bath/ASME FPMC 2016, University of Bath.

### Honors and awards:

LABEX award from Dean, College of Engineering and Petroleum, Kuwait University in 2003.

# Institutional service in last five years:

- 1. 2018- Now Member of Scholarships committee
- 2. 2018- Now Member of Abet committee
- 3. 2018 -Now Member of researches and conferences committee

# Professional development activities in last five years:

- 1. International Conference on Energy Research and Development, Kuwait, 2002
- 2. International Conference on Energy Research and Development, Kuwait, 2005
- 3. The 13<sup>th</sup> International Conference on Computional Scince, ICCS 2013, Barcelona, 2013.
- 4. Attended the "MOETC2014 Marine Offshore and Engineering Technology" Conference, The Public Authorities of Applied Science and Training, 4-6 March 2014, in Kuwait.