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Academic Qualification

1. PhD. Mechanical Engineering, Universiti Teknologi Malaysia, 2017
2. B.Eng. (Hons) Mechanical Engineering, Universiti Tun Hussein Onn Malaysia, 2008
3. Dip. Mechanical Engineering with Education, KUITTHO, 2005

Working Experiences / Appointment

1. Oct 2016 ~ to date Senior lecturer, Faculty of Mechanical Engineering, Universiti Malaysia Pahang
2. Nov 2008 ~ Oct 2016 Tutor, Faculty of Mechanical Engineering, Universiti Malaysia Pahang
2. May 2008 ~ Aug 2008 Mechanical Engineer, Excellift Sdn.Bhd

Research Interest

Vibration Analysis, Machinery Faults Diagnosis, Signal Processing, Machine Learning, Nanotechnology

Professional Qualification / Membership / Affiliation / Experience

1. Graduate Engineer, Board of Engineer, Malaysia (BEM) (59365A)
2. Graduate Engineer, The Institution Of Engineers, Malaysia (IEM) (39998)

Teaching Experience

1. Sem2 2008/2009
DMM2632 Industrial Design, 2 credits (37 Students)
BMM2523 Thermodynamic 2 (Tutorial), 3 credits (120 Students)
2. Sem1 2009/2010
DMM1312 Computer Programming, 2 credits (43 Students)
DMM3914 Final Year Project, 4 credits (4 Students)
3. Sem1 2014/2015
DMM2633 Manufacturing Technology, 3 credits (48 Students)
DMM3914 Final Year Project, 4 credits (1 Student)
4. Sem2 2014/2015
DMM3663 CNC Technology, 3 credits (49 Students)
DMM1911 Mechanical Technology Lab 1 (55 Students)
DMM3914 Final Year Project, 4 credits (2 Students)
5. Sem1 2015/2016
DMM2633 Manufacturing Technology, 3 credits (56 Students)
DMM1921 Mechanical Technology Lab 2 (55 Students)
6. Sem2 2015/2016
DMM3663 CNC Technology, 3 credits (54 Students)
DMM1911 Mechanical Technology Lab 1 (54 Students)
DMM3914 Final Year Project, 4 credits (4 Students)

7. Sem1 2016/2017
DMM2633 Manufacturing Technology, 3 credits (54 Students)
DMM3914 Final Year Project, 4 credits (1 Students)
8. Sem2 2016/2017
DMM3663 CNC Technology, 3 credits (55 Students)
DMM1911 Mechanical Technology Lab 1 (27 Students)
DMM3914 Final Year Project, 4 credits (2 Students)

List of Publications

International and National Journal

1. W.K. Ngui, M.Salman Leong, M.I. Shapiai, and M.H. Lim, "Blade fault diagnosis using artificial neural network", International Journal of Applied Engineering Research, Vol. 12 (4), 2017
2. Lim Meng Hee, M. S. Leong, J. I. Inayat-Hussain and W. K. Ngui, "Diagnosis of Blade Fault Based on Wavelet Scalogram and Blade Pass Vibration Signature Analysis", Journal of Vibration Engineering & Technologies, Vol. 3 (4), August 2015

International and National Conference Papers

1. W.K. Ngui, M.Salman Leong, Lim. Meng. Hee, and Ahmed.M.Abdelrhman, "Wavelet Analysis: Mother Wavelet Selection Methods", 2013 - International Conference on Advances in Mechanical Engineering
2. Ahmed.M.Abdelrhman, M.Salman Leong, Lim. Meng. Hee, and W.K. Ngui, "Application of Wavelet Analysis in Blade Faults Diagnosis for Multi-stages Rotor System", 2013 International Conference on Advances in Mechanical Engineering
3. Lim. Meng. Hee, M.Salman Leong, and W.K. Ngui, "Vibration Analysis of Rub in Rotating Machinery", 2013 4th International Conference on Mechanical and Aerospace Engineering (ICMAE 2013), Moscow, Russia, July 20-21, 2013
4. W. K. Ngui, M. Salman Leong, M. H. Lim, and K. H. Hui, "Detection of blade rub in rotor system", 16th Asia Pacific Vibration Conference, 2015
5. K. H. Hui, L. M. Hee, M. Salman Leong, M. K. Zakaria and W. K. Ngui, "Hybrid Method of Support Vector Machine and Dempster-Shafer Theory for Automated Bearing Fault Diagnosis", 16th Asia Pacific Vibration Conference, 2015
6. M. H. Lim and W. K. Ngui, "Diagnosis Of Twisted Blade In Rotor System", 22nd International Congress on Sound and Vibration (ICSV22), 2015

Conference Reviewer

1. Asia Pacific Vibration Conference (APVC) 2015
2. International Conference on Advances in Mechanics (ICAM) 2015
3. 4th International Conference on Mechanical Engineering Research, 2017

List of Research / Project

1. Development of Bearing Fault Detection System based on Vibration Signal, RDU 1403129, 15/11/2014 – 14/11/2016, Project member
2. A study of tyre cavity resonance noise effect to vehicle cabin acoustic level, RDU 150376, 1/10/2015 – 30/09/2017, Project member
3. Tyre cavity resonance noise coupling effect and control, RDU 150389, 1/10/2015 – 30/09/2017, Project member
4. Development of nickel-based nanopolymer for automotive dashboard, RDU1703150, 20/06/2017 – 19/06/2017, Project leader
5. Monitoring of Rotating Machinery Fault Diagnosis using Vibration and Artificial Intelligence Approaches, RDU171120, 30/04/2017 – 29/04/2017, Project leader

Awards / Research / Achievements

1. Inatex UTM 2012, Bronze, Insync Community - Based Smart Home Platform
2. Malaysia Technology Expo (MTE) 2013, Silver, Smart Gated Community and Automation System
3. SLAB/SLAI Scholarship, Ministry of Higher Education 2012-2014
4. Scholarship, Universiti Malaysia Pahang 2010-2014