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Education

PhD in Mechanical Engineering — *March, 2015*
Osaka University, Japan

M. Sc. in Mechanical Engineering — *September, 2011*
Osaka University, Japan

Bachelor of Science in Mechanical Engineering — *July, 2007*
Assiut University, Assiut, Egypt

Employment

Acting Chairman — *May, 2024 – Present*
Mechanical Power Engineering Department
Assiut University, Egypt

Associate Professor — *July, 2023 – Present*
Mechanical Power Engineering Department
Assiut University, Egypt

Assistant Professor — *April, 2015 – June, 2023*
Department of Mechanical Engineering
Assiut University, Egypt

Postdoctoral fellow — *October, 2019 – March, 2020*
Department *of Mechanical Science and Bioengineering*
Osaka *University, Japan*

Research Assistant — *October, 2014 – March, 2015*
Kawano's Laboratory, Department of Mechanical Science and Bioengineering
Osaka University, Japan

Teaching Assistant — *September, 2007– September, 2009*
Department of Mechanical Engineering.
Assiut University, Egypt.

Patents

- S. Kawano, H. Shintaku, Osman, O. O., and M. Hirata, (2014). Pump and liquid supply method, JP Patent WO2014073638 A1.

Publications

Journal Papers

1. Hassan, Hamdy, **Osman Omran Osman**, Mahmoud N. Abdelmoez, and Saleh abo-Elfadl. "Experimental Assessment of Novel Designed Solar Hot Water Storage Collector Incorporating an Array of Partitioned Ducts Absorber." ***Solar Energy*** 262 (2023/09/15/ 2023): 111838.

2. Hassan, Hamdy, **Osman Omran Osman**, Mahmoud N. Abdelmoez, and Saleh abo-Elfadl. "Energy and Exergy Evaluation of New Design Nabla Shaped Tubular Solar Air Heater (∇ Tsah): Experimental Investigation." ***Energy*** (2023/04/22): 127451.

3. Hassan, Hamdy, Mahmoud N. Abdelmoez, **Osman Omran Osman**, and Saleh abo-Elfadl. "Experimental Evaluation of the Performance of Newly Designed Tubular Sah with Infinity (∞) Shaped Inner Tubes." ***Solar Energy*** 256 (2023/05/15): 202-214.

4. Hassan, H, **Osman Omran Osman**, Abo-Elfadl, S., "Novel dynamic simulation model and detailed performance evaluation of single slope solar still: Impact of side walls material." ***Solar Energy*** 244 (2022): 298-314.
5. **Osman Omran Osman**, Abouel-Kasem, A., Ahmed, S.M., 2021. "Shock Waves as dominant Mechanism for Cavitation damage", **Journal of Tribology**, 144(6), p.062301.

6. Abouel-Kasem, A., **Osman Omran Osman**, Karrab, S.A., Ahmed, S.M., 2021, "The Limited Role of Pit Formed by Microjet in Evolution of Cavitation Erosion in the Incubation Period", **Journal of Tribology**, 144(4), p.041702.

7. Nasef, M. H., Hashim, M. A., **Osman Omran Osman**, 2019, "Experimental Investigation of Fault Diagnosis for Centrifugal Pump Based on Vibration Signals", **International Journal of Advanced Science and Technology**, 29(1), pp. 889- 898.

8. Mohamed, A. F., **Osman Omran Osman**, Ghazaly, N. M., 2019, "Study of Friction Coefficient of Wind Turbine Brake System under Environmental Conditions", **International Journal of Advanced Science and Technology**, 28(12), pp. 169- 177.

9. **Osman Omran Osman**, Shirai, A., Kawano, S., 2015, "A numerical study on the performance of micro-vibrating flow pumps using the immersed boundary method", **Microfluidics and Nanofluidics**, pp. 1-14.

10. **Osman Omran Osman**, Shintaku, H., Kawano, S., 2012, "Development of micro-vibrating flow pumps using MEMS technologies," **Microfluidics and Nanofluidics**, pp. 1-11,

Conference Papers

1. **Osman Omran Osman**, Kawano, S., 2013, "Computational Fluid Dynamics Modeling of Micro-Vibrating Flow Pumps", Tenth International Conference on Flow Dynamics (ICFD 2013), Sendai, Miyagi, Japan, pp pp. 582-583.

2. **Osman Omran Osman**, Hirata, M., Shintaku, H., Kawano, S., 2012, "Improvement of Pumping Performance of Micro-Vibrating Flow Pumps by Controlling Valve Motion", International Symposium on Innovative Nanobiodevices, Nagoya, japan, P. 82.

3. **Osman Omran Osman**, Hirata, M., Shintaku, H., Kawano, S., 2012, "Effect of Valve Amplitude on Pumping Performance of Micro-Vibrating Flow Pump", Proceedings of Design Bionics Symposium, Osaka, japan.

4. **Osman Omran Osman**, Shintaku, H., Kawano, S., 2011, "Experimental System for Performance Evaluation of Micro-Vibrating Flow Pump", Proceedings of International Workshop on Micro/Nano-Engineering, Kyoto, Japan, P. 110.
5. **Osman Omran Osman**, Shintaku, H., Kawano, S., 2011, "Flow visualization around actuating valve of micro-vibrating flow pump", Proceedings of ASME-JSME-KSME Joint Fluids Engineering Conference, Hamamatsu, Japan, (36015-1)-(36015-3).