

ALAGAPPA UNIVERSITY

(Accredited with "A+" Grade by NAAC (CGPA:3.64) in the Third Cycle & Graded as Category-I University and
Granted Autonomy by MHRD-UGC)

KARAIKUDI - 630 003

Prof.B.Vaseeharan
Registrar i/c

Date: 07.01.2021

Prof. S. Karuppuchamy, Head, Department of Energy Science, Alagappa University, Karaikudi has been awarded the degree of **Doctor of Science in Chemistry** from Periyar University, Salem for his outstanding research work in the field of Chemical Science for developing advanced nanomaterials for photocatalytic energy harvesting and environmental remediation. In the past 22 years, he has developed several multifunctional photocatalytic nanocomposites for hydrogen fuel production and to treat industrial wastewaters.

His **D.Sc. thesis** demonstrates the development of multifunctional photocatalytic materials for the effective treatment of organic dyes and H₂ production. Further, the thesis elaborates on a novel method for incorporating carbon nanomaterials into a series of metal oxides, metal nitrides, metal phosphides and insulating materials to enhance the photocatalytic efficiency. The effect of light absorption and electron transfer properties of carbon clusters with material combination/composition is elaborated. In summary, the thesis demonstrated the possible usage of the carbon cluster into semiconducting metal oxide for the effective treatment of waste-water and efficient generation of hydrogen fuel through photocatalytic technique. The functional property of carbon incorporated semiconducting metal oxide provided a novel solution for the waste-water remediation and hydrogen fuel production from water.

Today, Prof. Karuppuchamy met Prof.N.Rajendran, Vice-Chancellor of Alagappa University, who congratulated him and exhorted him to continue his meritorious research work.

He has visited various countries like Japan, USA, Germany, Sweden, Switzerland, South Korea, Thailand, Singapore and Malaysia for research purposes. He has research collaborations with various International institutions like SPD Laboratory, Co. Ltd., Japan, Kyushu Institute of Technology, Japan, Kinki University, Japan, University Putra Malaysia,

Malaysia, University Technology Mara, Malaysia, Uppsala University, Sweden and EPFL, Lausanne, Switzerland.

Prof. S. Karuppuchamy's research contribution has more than 2414 citations to his credit. His h-index is 32 and i10-index is 58. He is rendering his service as reviewer for more than 40 International Journals. He is the recipient of various International awards viz, MONBUSHO Researcher Award from the Ministry of Education, Government of Japan, Innovation Award and Visiting Researcher Award from Henkel KGaA, Germany, Asia-Biomass Energy Researcher Award from New Energy Foundation, Government of Japan, Scientific Adviser Award from TSM Co. Ltd., South Korea and SPD Laboratory Co. Ltd., Japan and Leading Scientists of the World 2013 from International Biographical Centre, Cambridge, England. He received Young Scientist Award from DST, Government of India. In addition to that, he is the recipient of the best researcher award by EET-CRS, Bangalore.

In recognition of his research work in the field of **Nanomaterials and Photoelectrochemistry**, the Tamil Nadu State Council for Science and Technology conferred on Prof. Karuppuchamy, the **Tamil Nadu Scientist Award (TANSA)** in **Chemical Sciences** for the year 2017.

Alagappa University campus is enriched with the facilities such as Biogas Plants, Solar Power Plants and Solar Street Lights through his efforts.

Registrar i/c