



**Dr. R. Yuvakkumar**  
**Assistant Professor**

### Contact

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**Academic Qualifications: M.A./M.Sc./M.Ed./M.Phil./Ph.D./**

**Teaching Experience: \_\_\_10\_Years**

**Research Experience: \_\_\_12\_Years**

### Additional Responsibilities

1. Co-Ordinator – Dept. Alumni, Parent Teacher Meet
2. Co-Ordinator – Dept. Photographic Club
3. Co-Ordinator – SWAYAM - MOOC, TN-SET
4. Co-Ordinator – Dept. Magazine and AZHAGU Newsletter
5. VPP coordinator (Nemam Village, 2017)

6. Question paper setter in various colleges and universities for UG/PG programme.

### Areas of Research

Supercapacitors, Water splitting, Photocatalytic dye degradation, Hydrogen generation and storage, Sensors, Nanomaterials, Thin Films

### Research Supervision / Guidance

Program of Study		Completed	Ongoing
Research	Ph.D.	03	04
	M.Phil.	07	03
Project	PG	24	06
	UG / Others	M.Tech - 06	Xx

### Research Publications

International		National		Others
Journals	Conferences	Journals	Conferences	Books / Chapters / Monographs / Manuals
250	27	1	15	05

h-index : 38  
i10 index : 141  
Total Citations : 5884

### Funded Research Projects

#### Completed Projects

S. No	Agency	Period		Project Title	Budget (Rs. In lakhs)
		From	To		
1	UGC	2016	2018	Development, characterization and cancer targeting potential of bioinspired magnetite (Fe <sub>3</sub> O <sub>4</sub> ) nanopowders	6.00
2	MHRD-RUSA	2018	2019	Advanced Materials for Sustainable Energy and Sensors	5.00

## Patents Granted

1. Rajendran, V., Kannan, N., **Yuvakkumar, R.**, Elango V. and Manivasakan, P. A novel approach to prepare crystalline nano molybdenum particles, Indian Patent Ref. No.: 218/CHE/2009 dt. 30.01.2009, Journal No. 33/2010; Publication Date: 13/08/2010. **Granted Application, Patent Number 297894.**
2. Sun Ig Hong, Suresh, J., **Yuvakkumar, R.**, A. Joseph Nathanael, and Sundrarajan, M., Method for Manufacturing ZnO Nanopowder and ZnO Nanopowder Manufactured by the Method, **Granted Application, Korean Patent Number 10-1617994**, Registration No.:1016179940000 Registration Date : 2016.04.27.
3. **Yuvakkumar, R.**, Ravi, G., Isacfranklin, M., Hong, S.I., Foo Shini, Thambidurai, M., Cuong Dang, and Dhayalan Velauthapillai. An improved quaternary chalcogenide Cu<sub>2</sub>NiSnS<sub>4</sub> material and a method of manufacture thereof, Indian Patent Ref. No.: 202041055941 dt. 23.12.2020, Publication Date: 26/03/2021. **Granted Application, Patent Number 389221.**
4. **Yuvakkumar, R.**, Ravi, G., V. Thirumal, SP Keerthana, and Dhayalan Velauthapillai. A METHOD OF PREPARING MXENE NANOSHEETS, Indian Patent Ref. No.: 202141042819 dt. 22.09.2021, Publication Date: 04/03/2022. **Granted Application, Patent Number 406697.**

## Patents Published

1. **Yuvakkumar, R.**, Ravi, G., V. Thirumal, SP Keerthana, and Dhayalan Velauthapillai. A METHOD OF PREPARING 3D SI@MXENE/GRAPHENE CRUMBLED SPHERICAL NANOCOMPOSITES, Indian Patent Ref. No.: 202141042818 dt. 22.09.2021, Publication Date: 04/03/2022. **FER Reply Filed.**
2. **Yuvakkumar, R.**, Ravi, G., V. Thirumal, K Dhamodharan, B Saravanakumar, M Thambidurai, Cuong Dang, and Dhayalan Velauthapillai. A METHOD OF PREPARING 3D BIO-ACTIVATED PORES CARBON NANOSHEETS FROM TAMARIND FRUIT SHELLS, Indian Patent Ref. No.: 202241008151 dt. 16.02.2022, Publication Date: 04/03/2022. **FER Reply Filed.**
3. **Yuvakkumar, R.**, Ravi, G., Isacfranklin, M., V. Thirumal, P Senthilkumar, and Dhayalan Velauthapillai. HYDROGEN FREE METHOD OF GROWING CARBON NANORODS, Indian Patent Ref. No.: 202141018296 dt. 20.04.2021, Publication Date: 21/10/2022. **FER Issued.**
4. **Yuvakkumar, R.**, Ravi, G., Isacfranklin, M., and Dhayalan Velauthapillai. AN IMPROVED ELECTRODE WITH SUPERIOR SUPERCAPACITIVE PERFORMANCES

- AND A METHOD OF MANUFACTURE THEREOF, Indian Patent Ref. No.: 202141013142 dt. 25.03.2021, Publication Date: 30/09/2022. **FER Issued.**
5. **Yuvakkumar, R.,** Ravi, G., Isacfranklin, M., Hong, S.I., and Dhayalan Velauthapillai. A HETEROSTRUCTURED (SmCoO<sub>3</sub>/rGO) MATERIAL AND A METHOD OF MANUFACTURE THEREOF, Indian Patent Ref. No.: 202141008342 dt. 27.02.2021, Publication Date: 02/09/2022. **Application Awaiting Examination.**
  6. **Yuvakkumar, R.,** Ravi, G., Isacfranklin, M., and Dhayalan Velauthapillai. MORPHOLOGICAL EVOLUTION OF CARNATION FLOWER LIKE CU<sub>2</sub>COSNS<sub>4</sub> BATTERY TYPE ELECTRODES AND PREPARATION METHODS THEREOF, Indian Patent Ref. No.: 202241042493 dt. 25.07.2022, **Application not yet published.**
  7. Rajendran, V., Suryaprabha, R., Shanmuga Priya, D. and **Yuvakkumar, R.,** P. TiO<sub>2</sub> and Neem Doped Chitosan - Hydroxypropyl Methylcellulose Nanocomposite Films for Food Packaging Applications, Indian Patent Ref. No.: 736/CHE/2014 dt. 17.02.2014. Journal No. 33/2010; Publication Date: 21/08/2015.
  8. Sundrarajan, M., Sun Ig Hong, Suresh, J., **Yuvakkumar, R.,** and Rajiv Gandhi, R. Bioinspired metal oxide nanopowders for biomedical applications, Indian Patent Ref. No.: 3557/CHE/2014 dt. 20.07.2014. Journal No. 33/2010; Publication Date: 01/07/2016.
  9. Rajendran, V., Kannan, N., and **Yuvakkumar, R.,** Influence of nano silica on the growth and yield of maize crop, Indian Patent Ref. No.: 1135/CHE/2009 dt. 18.05.2009, Journal No. 33/2010; Publication Date: 25/03/2016.

## R&D Books

1. **Abstract Book** - IUPAC-Sponsored International Conference on Nanomaterials and Nanotechnology (NANO-2010), Macmillan Advanced Research Series (ISBN 023-033-206-4), Edited by V. Rajendran, P. Manivasakan, **R. Yuvakkumar,** P. Paramasivam, B. Hillebrands and K. E. Geckeler.
2. **Compendium on Indian Capability on Nanoscience and Technology,** Published by Macmillan Publishers India Ltd (ISBN 978-935-059-030-0) Edited by V.Rajendran, W.Selvamurthy, K.Saminathan, D.B.S.Sethi, P.Prabu, **R.Yuvakkumar,** P.Manivasakan and P.Paramasivam.
3. **Proceeding Book on Applications of Nano Materials: Electronics, Energy and Environment** - IUPAC-Sponsored International Conference on MACRO-AND SUPRAMOLECULAR ARCHITECTURES AND MATERIALS (MAM-12): Nano Systems and Applications, Bloomsbury Publishing India PVT. Limited (ISBN 978-93-82563-35-8), Edited by V. Rajendran, **R. Yuvakkumar,** K. Thyagarajah and K.E. Geckeler.

### R&D Book Chapters

1. Structural characterization of beryllium and indium oxide powders, **R. Yuvakkumar**, V. Milton, G. Ravi, S.I. Hong, Contemporary Dielectric Materials, Chapter 9, Materials Research Forum, Published online 1/1/2017, 16 pages, DOI: <http://dx.doi.org/10.21741/9781945291135-9>.
2. Synthesis and structural characterization of gallium oxide powders **R. Yuvakkumar**, D. Sidharth, G. Ravi, S.I. Hong, Contemporary Dielectric Materials, Chapter 9, Materials Research Forum, Published online 1/1/2017, 9 pages, DOI: <http://dx.doi.org/10.21741/9781945291135-2>.

### Distinctive Achievements / Awards by Professional Bodies

1. **Young Scientist Award 2020**, Academy of Sciences, Chennai, India
2. **Young Faculty in Science**, Venus International Research Foundation, India
3. **Visiting Fellowship**, 2017-18, 3 months, Jawaharlal Nehru Centre for Advanced Scientific Research, JNCASR, India
4. **Brain Korea Research Fellowship**, National Research Foundation, South Korea
5. **Senior Research Scientist**, University of Science and Technology, South Korea
6. **Young Scientist Award**, Venus International Research Foundation, India
7. **Visiting Scientist**, National Research Foundation, South Korea

### Events organized in leading roles

Number of Seminars / Conferences / Workshops / Events organized:

1. Organizing Secretary, National Seminar on Advanced Materials Research, Alagappa University, 19<sup>th</sup> January, 2017.
2. Organizing Secretary, National Conference on Advanced Materials for Sustainable Energy and Sensors, Alagappa University, 20-22<sup>nd</sup> March, 2019.
3. Organizing Secretary, International Conference on Advanced Materials for Sustainable Energy and Sensors, Alagappa University, 16-17<sup>th</sup> September, 2019.

### Events organized as an active member

1. Active Member of Organising Committee, INTERNATIONAL CONFERENCE, MAM-2012, November 21-25, 2012.
2. Active Member of Organising Committee, DST-INSPIRE PROGRAMME, 2011.

3. Active Member of Organising Committee, INTERNATIONAL CONFERENCE, NANO-2010, December 13-16, 2010.
4. Active Member of Organising Committee, DST PAC (Project Advisory Committee) Meeting, July 6-9, 2009
5. Active Member of Organising Committee, National Symposium on Acoustics NSA 2007, December 5-7, 2007
6. Active Member of Organising Committee, National Symposium Instrumentation'32 (NSI'32), October 24-26, 2007
7. Active Member of Organising Committee, ACT NEXT :Noble prize in Physics 2017 at Department of Physics, Alagappa University on 28th March 2018.
8. Active Member of Organising Committee, International Conference on momentous role of nanomaterials in renewable energy devices (IC MNRE 2018 ) Alagappa University, Karaikudi, 1-2 March 2018
9. Active Member of Organising Committee, Business Oriented Analytical Research and Development (BOARD-2018) at Department of Physics, Alagappa University during 31st January – 1st February 2018.
10. Active Member of Organising Committee, National Conference on Futuristic Materials (NCFM-2017) at Department of Physics, Alagappa University during 27 & 28th March 2017.
11. Active Member of Organising Committee, National Theme Meet on University-Industry Interface 2017 (NTM U21-2017), Alagappa University during 20th September 2017.
12. Active Member of Organising Committee, ACT NEXT :Noble prize in Physics 2016 at Department of Physics, Alagappa University on 28th April 2017.
13. Active Member of Organising Committee, Business Oriented Hands-on Training on Analytical Instrumentation (HI-BOAT-2017) at Department of Physics, Alagappa University during 2nd & 3rd March 2017.
14. Active Member of Organising Committee, Organized a National Seminar on “Recent Advancements in Frontier Areas of Materials Science” at Department of Physics, Alagappa University, Karaikudi, during 23-24th March, 2016.
15. Active Member of Organising Committee, Alagappa University Celebrates Themed Nobel Excellence Talks – 2015 (ACT NEXT-2015) at Department of Physics, Alagappa University on 18th March 2016.

### Overseas Exposure / Visits

1. **Senior Research Scientist**, Division of Physical Metrology, **Korea Research Institute of Standards and Science, Daejeon 305-600, South Korea, 2014-2015.**

2. **Post-Doctoral Researcher**, Department of Nanomaterials and Engineering, **Chungnam National University, Daejeon, South Korea**, 2013- 2014.
3. 14<sup>th</sup> Asian Chemical Congress (14 ACC), Contemporary Chemistry for Sustainability and Economic Sufficiency, 5-8 September 2011, **Bangkok, Thailand**. Yuvakkumar, R., and Rajendran, V. Influence of nano nutrients on heterocyst forming cyanobacterium *Anabaena ambigua* Rao.
4. EMCEM 2014 - 2<sup>nd</sup> International conference on Energy Material, Chemical Engineering and Mining Engineering, 11-12 January 2014, **Wuhan, China**. R. Yuvakkumar, J. Suresh, A. Joseph Nathanael, M. Sundrarajan and S.I. Hong A comparative study on antibacterial and wash durability behaviour of ZnO and CuO nanoparticles treated cotton fabric using sodium alginate as cross linker.
5. 2<sup>nd</sup> International conference on Mechanics, Dynamic Systems and Material Engineering (MDSME2014), May 24-25, 2014, **Guangzhou, China**. R. Yuvakkumar, J. Suresh and S.I. Hong Green synthesis of zinc oxide nanoparticles.
6. The Korean Institute of Metal and Materials / 2014 Spring Meeting, April 24-25, 2014, **Daegu, South Korea**. R. Yuvakkumar, K. Yong Keun, A. Joseph Nathanael and S.I. Hong Rambutan peels promoted biomimetic synthesis of zinc oxide nanocrystals.

## Membership in

### Professional Bodies

1. Life Member: Indian Physics Association, Life Membership No. GEN/LM/13172
2. Life Member: Solar Energy.
3. Life Member: PVR Research Foundation.
4. Life Member in Materials Research Society of India
5. Life Member in Indian Society of Atomic and Molecular Physics
6. Life Member in Society for Advancement of Electrochemical Science and Tech., LF201801129

### Editorial Board

1. Journal of Condensed Matter & Materials Physics,
2. Micro and Nanosystems
3. Journal of Modern and Applied Physics
4. Journal of Clinical Breast Cancer Research
5. Nanometrics
6. Journal of Biological and Chemical Technology

### Advisory Board

1. 2017 International Conference on Materials Engineering and Nano Sciences Singapore January 7-9, 2017, International Technical Committee

2. 2018 International Conference on Mechanical Manufacturing and Industrial Engineering, MMIE 2018, Kuala Lumpur, Malaysia, International Technical Committee
3. 2018 International Conference on Advanced Composite Materials, ICACM 2018, Kuala Lumpur, Malaysia

#### **Academic Bodies (such as Board of Studies etc.,)**

1. Board of Studies-Member: B.Sc., Physics, Sri Vasavi College, Erode
2. Board of Studies-Member: B.Tech., and M.Tech., Nanoscience and Technology, K.S.R. Rangasamy College of Technology, Tiruchengode

#### **Others**

1. Member, Trialect, United States Incorporation, USA
2. Doctoral Committee Member, Periyar University
3. Doctoral Committee Member, Bharathiyar University
4. Doctoral Committee Member, Karunya University

#### **Resource persons in various capacities**

Number of Invited / Special Lectures delivered: 10

#### **Others**

1. Articles published in Newspapers / Magazines : 02
2. Products developed : 03
3. No. of PhD Thesis evaluated : 02
4. No. of PhD Public Viva Voce Examination conducted : 02

#### **Research Publications**

<b>2023</b>		
<b>269</b>	P Mohana, <b>R Yuvakkumar</b> , G Ravi, M Thambidurai, Hung D Nguyen	<b>3.423</b>
	Copper doped zinc sulfide nanostructure for alternative energy production	
	Materials Letters	
<b>268</b>	Isacfranklin Melkiyur, <b>Yuvakkumar Rathinam</b> , P Senthil Kumar, Asaithambi Sankaiya, Selvakumar Pitchaiya, Ravi Ganesan, Dhayalan Velauthapillai	<b>16.8</b>
	A comprehensive review on novel quaternary metal oxide and sulphide electrode materials for supercapacitor: Origin, fundamentals, present perspectives and future aspects	



	Renewable and Sustainable Energy Reviews	
<b>267</b>	Srinivasan Swathi, Marimuthu Priyanga, <b>Yuvakkumar Rathinam</b> , Ravi Ganesan, Abdullah G Al-Sehemi, Dhayalan Velauthapillai	<b>4.132</b>
	Neodymium-Doped Novel Barium Tungstate Nanospindles for the Enhanced Oxygen Evolution Reaction	
	ACS Omega	
<b>266</b>	Vijayakumar Gunasekaran, <b>Rathinam Yuvakkumar</b> , Ravi Ganesan, Surya Cholayil Palapetta, Harichandran Gurusamy	<b>8.431</b>
	Biological evaluation of polycyclic chalcone based acrylamides in human MCF-7 and HeLa cancer cell lines	
	Environmental Research	
<b>2022</b>		
<b>265</b>	S Swathi, <b>R Yuvakkumar</b> , G Ravi, M Shanthini, Abdullah G Al-Sehemi, M Thambidurai, Hung D Nguyen, Dhayalan Velauthapillai	<b>6.371</b>
	Effect of sodium dodecyl sulfate surfactant concentrations on the novel strontium copper oxide nanostructures for enriching hydrogen evolution reaction electrochemical activity in alkaline solution	
	Journal of Alloys and Compounds, 928, 167001	
<b>264</b>	V Thirumal, <b>R Yuvakkumar</b> , P Senthil Kumar, Gayathri Rangasamy, G Ravi, M Isacfranklin, Dhayalan Velauthapillai, M Thambidurai, Hung D Nguyen	<b>8.035</b>
	Morphology investigation on direct growth ultra-long CNTs by chemical vapour deposition method for high performance HER applications	
	Fuel, 330, 125532	
<b>263</b>	B Jansi Rani, S Swathi, <b>R Yuvakkumar</b> , G Ravi, R Rajalakshmi, Abdullah G Al-Sehemi, Dhayalan Velauthapillai	<b>8.907</b>
	Samarium doped barium molybdate nanostructured candidate for supercapacitors	
	Journal of Energy Storage, 56, 105945	
<b>262</b>	M Karuppaiah, B Sriram, P Sakthivel, S Asaithambi, D Sidharth, V Balaji, S-F Wang, <b>R Yuvakkumar</b> , G Ravi	<b>7.613</b>
	Mesoporous oxygen vacancy 3D-rhombohedral Ov-Mn <sub>2</sub> O <sub>3</sub> mixed with rGO@ CNTs as cathode material for self-charging pouch-type hybrid supercapacitor applications	
	Materials Today Chemistry, 26, 101017	
<b>261</b>	K Muhil Eswari, S Asaithambi, M Karuppaiah, P Sakthivel, V Balaji, DK Ponelakkia, <b>R</b>	<b>5.532</b>

	<b>Yuvakkumar, P Kumar, N Vijayaprabhu, G Ravi</b>	
	Green synthesis of ZnO nanoparticles using Abutilon Indicum and Tectona Grandis leaf extracts for evaluation of anti-diabetic, anti-inflammatory and in-vitro cytotoxicity activities	
	Ceramics International, 48, 33624-33634	
<b>260</b>	Thandapani Marimuthu, <b>Rathinam Yuvakkumar</b> , Ganesan Ravi, Xueqing Xu, Gang Xu, Dhayalan Velauthapillai	<b>5.164</b>
	Hydrothermal construction of flower-like CuS microsphere electrocatalysts for hydrogen evolution reactions in alkaline fresh water, alkaline seawater, and seawater	
	International Journal of Energy Research, 46, 19723-19736	
<b>259</b>	SP Keerthana, S Gayathri, <b>R Yuvakkumar</b> , L Kungumadevi, G Ravi, Abdullah G Al-Sehemi, Dhayalan Velauthapillai	<b>8.431</b>
	Conversion and reducing agent effect on zero valent iron into Fe <sub>3</sub> O <sub>4</sub> for photocatalytic degradation under UV light irradiation	
	Environmental Research, 214, 113959	
<b>258</b>	SP Keerthana, <b>R Yuvakkumar</b> , P Senthil Kumar, G Ravi, Dhayalan Velauthapillai	<b>7.45</b>
	Nd doped ZrO <sub>2</sub> photocatalyst for organic pollutants degradation in wastewater	
	Environmental Technology & Innovation, 28, 102851	
<b>257</b>	M Sangeetha Vidhya, <b>R Yuvakkumar</b> , G Ravi	<b>5.164</b>
	Construction of bimetallic ZnSe–CoSe <sub>2</sub> flower as a finely tuned electrode for enhancing supercapacitor performance	
	International Journal of Energy Research, 46, 19894-19906	
<b>256</b>	Sunil Babu Eadi, Han Yan, P Senthil Kumar, <b>Yuvakkumar Rathinam</b> , Hi-Deok Lee	<b>8.431</b>
	IGZO-decorated ZnO thin films and their application for gas sensing	
	Environmental Research, 214,	
<b>255</b>	S Swathi, <b>R Yuvakkumar</b> , P Senthil Kumar, G Ravi, M Thambidurai, Cuong Dang, Dhayalan Velauthapillai	<b>7.139</b>
	PEG mediated tetragonal calcium molybdate nanostructures for electrochemical energy conversion applications	
	International Journal of Hydrogen Energy	
<b>254</b>	M Sangeetha Vidhya, <b>R Yuvakkumar</b> , P Senthil Kumar, G Ravi, Dhayalan Velauthapillai, Majede Bijad	<b>2.781</b>
	Recent Progression of Flower Like ZnSe@MoSe <sub>2</sub> Designed as an Electrocatalyst for Enhanced Supercapacitor Performance	

	Topics in Catalysis, 65, 5, 684-693	
<b>253</b>	Baskaran Chinnasamy, R Yuvakkumar, P Senthil Kumar, G Ravi, Dhayalan Velauthapillai, Ceren Karaman, Mehmet Lütfi Yola, Hassan Karimi-Maleh	<b>2.781</b>
	Mapping and Scientometric Measures on Research Publications of Energy Storage and Conversion	
	Topics in Catalysis, 65,5, 753-764	
<b>252</b>	Shini Foo, Mariyappan Thambidurai, Ponnusamy Senthil Kumar, <b>Rathinam Yuvakkumar</b> , Yizhong Huang, Cuong Dang	<b>4.672</b>
	Recent review on electron transport layers in perovskite solar cells	
	International Journal of Energy Research, 2022	
<b>251</b>	Murugesan Karuppaiah, Perumal Sakthivel, Sankaiya Asaithambi, Balasubramanian Sriram, Tansir Ahamad, Saad M Alshehri, <b>Rathinam Yuvakkumar</b> , Ganesan Ravi	<b>6.147</b>
	Heterostructured $O_v\text{-Mn}_2\text{O}_3@Cu_2SnS_3@SnS$ Composite as Battery-Type Cathode Material for Extrinsic Self-Charging Hybrid Supercapacitors	
	Advanced Materials Interfaces, 2200104, 2022	
<b>250</b>	M Isaacfranklin, S Daphine, <b>R Yuvakkumar</b> , L Kungumadevi, G Ravi, Abdullah G Al-Sehemi, Dhayalan Velauthapillai	<b>5.532</b>
	$ZnCo_2O_4/CNT$ composite for efficient supercapacitor electrodes	
	Ceramics International, 2022	
<b>249</b>	SP Keerthana, K Kowsalya, P Senthil Kumar, <b>R Yuvakkumar</b> , L Kungumadevi, G Ravi, Dhayalan Velauthapillai	<b>8.943</b>
	Effect of grinding time on bismuth oxyhalides optical and morphological properties influence on photocatalytic removal of organic dye	
	Chemosphere, 135272, 2022	
<b>248</b>	SP Keerthana, <b>R Yuvakkumar</b> , G Ravi, Abdullah G Al-Sehemi, Dhayalan Velauthapillai	<b>8.943</b>
	Investigation of optimum Mn dopant level on $TiO_2$ for dye degradation	
	Chemosphere, 135574, 2022	
<b>247</b>	B Jansi Rani, S Swathi, <b>R Yuvakkumar</b> , G Ravi, P Navaneethakrishnan, Abdullah G Al-Sehemi, Dhayalan Velauthapillai	<b>4.383</b>
	Ag doped $ZnSnO_3$ nanocubes: Promotion on the charge storage mechanism for supercapacitors	
	Journal of Physics and Chemistry of Solids, 110894, 2022	
<b>246</b>	S Swathi, <b>R Yuvakkumar</b> , G Ravi, Abdullah G Al-Sehemi, Dhayalan Velauthapillai	<b>5.598</b>

	Rare earth metal (Sm)-doped NiMnO <sub>3</sub> nanostructures for highly competent alkaline oxygen evolution reaction	
	Nanoscale Advances, 2022	
<b>245</b>	M Sangeetha Vidhya, <b>R Yuvakkumar</b> , P Senthil Kumar, G Ravi, Dhayalan Velauthapillai, Padideh Naderi Asrami	<b>2.781</b>
	Electrochemical Enhancement of Binary CuSe <sub>2</sub> @MoSe <sub>2</sub> Composite Nanorods for Supercapacitor Application	
	Topics in Catalysis, 65, 5,668-676, 2022	
<b>244</b>	M Isacfranklin, <b>Rathinam Yuvakkumar</b> , Ganesan Ravi, Dhayalan Velauthapillai	-
	Morphological evolution of carnation flower like Cu <sub>2</sub> CoSnS <sub>4</sub> battery type electrodes	
	Materials Advances, 2022	
<b>243</b>	V Thirumal, <b>R Yuvakkumar</b> , P Senthil Kumar, G Ravi, M Shobana, B Saravanakumar, Dhayalan Velauthapillai	<b>7.139</b>
	Nitrogen and nitrogen-sulfur doped graphene nanosheets for efficient hydrogen productions for HER studies	
	International Journal of Hydrogen Energy, 2022	
<b>242</b>	SP Keerthana, <b>R Yuvakkumar</b> , P Senthil Kumar, G Ravi, Dhayalan Velauthapillai	<b>8.431</b>
	Surfactant induced copper vanadate ( $\beta$ -Cu <sub>2</sub> V <sub>2</sub> O <sub>7</sub> , Cu <sub>3</sub> V <sub>2</sub> O <sub>8</sub> ) for different textile dyes degradation	
	Environmental Research, 211, 112964, 2022	
<b>241</b>	M Karuppaiah, B Sriram, P Sakthivel, S Asaithambi, D Sidharth, V Balaji, S-F Wang, <b>R Yuvakkumar</b> , G Ravi	<b>7.613</b>
	Mesoporous oxygen vacancy 3D-rhombohedral O <sub>v</sub> -Mn <sub>2</sub> O <sub>3</sub> mixed with rGO@CNTs as cathode material for self-charging pouch-type hybrid supercapacitor applications	
	Materials Today Chemistry, 26, 101017, 2022	
<b>240</b>	M Shobana, P Balraju, P Senthil Kumar, N Muthukumarasamy, <b>R Yuvakkumar</b> , Dhayalan Velauthapillai	<b>7.632</b>
	Investigation on the performance of nanostructure TiO <sub>2</sub> bi-layer as photoanode for dye sensitized solar cell application	
	Sustainable Energy Technologies and Assessments, 52,102295	
<b>239</b>	V Thirumal, <b>R Yuvakkumar</b> , B Saravanakumar, G Ravi, M Isacfranklin, M Shobana, Abdullah G Al-Sehemi, Dhayalan Velauthapillai	<b>8.035</b>
	Carbonization and optimization of biomass waste for HER application	
	Fuel, 324, 124466, 2022	
<b>238</b>	Huy Hoang Phan Quang, Nga Thi Dinh, Thanh Ngoc Tran Thi, Luan Tran Ngoc Bao,	<b>7.34</b>

	<b>Rathinam Yuvakkumar</b> , Van-Huy Nguyen	
	Fe <sup>2+</sup> , Fe <sup>3+</sup> , Co <sup>2+</sup> as highly efficient cocatalysts in the homogeneous electro-Fenton process for enhanced treatment of real pharmaceutical wastewater	
	Journal of Water Process Engineering, 46, 102635	
<b>237</b>	V Thirumal, <b>R Yuvakkumar</b> , P Senthil Kumar, B Saravanakumar, G Ravi, M Shobana, Dhayalan Velauthapillai	<b>8.035</b>
	Preparation and characterization of antimony nanoparticles for hydrogen evolution activities	
	Fuel, 325, 124908, 2022	
<b>236</b>	V Thirumal, <b>R Yuvakkumar</b> , P Senthil Kumar, G Ravi, Dhayalan Velauthapillai	<b>8.035</b>
	Facile preparation and characterization of MXene@Platinum nanocomposite for energy conversion applications	
	Fuel, 317, 123493, 2022	
<b>235</b>	V Thirumal, <b>R Yuvakkumar</b> , P Senthil Kumar, SP Keerthana, G Ravi, M Thambidurai, Cuong Dang, Dhayalan Velauthapillai	<b>8.431</b>
	Facile hydrothermal synthesis of MXene@antimony nanoneedle composites for toxic pollutants removal	
	Environmental Research, 210,112904, 2022	
<b>234</b>	M Thambidurai, G Saranya, <b>R Yuvakkumar</b> , Cuong Dang	<b>3.574</b>
	Experimental and theoretical studies of cesium-doped cadmium oxide nanostructured films	
	Materials Letters, 309, 131346, 2022	
<b>233</b>	S Swathi, <b>R Yuvakkumar</b> , P Senthil Kumar, G Ravi, Dhayalan Velauthapillai	<b>8.035</b>
	Polyvinylpyrrolidone-assisted novel copper antimony sulfide nanorods for highly efficient hydrogen evolution reaction	
	Fuel, 314, 123096, 2022	
<b>232</b>	S Swathi, <b>R Yuvakkumar</b> , P Senthil Kumar, G Ravi, A Manigandan, Dhayalan Velauthapillai	<b>8.035</b>
	Scheelite-type Fe substituted SrWO <sub>4</sub> for hydrogen evolution reaction under alkaline conditions	
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<b>231</b>	S Asaithambi, V Balaji, M Karuppaiah, P Sakthivel, K Muhil Eswari, <b>R Yuvakkumar</b> , P Selvakumar, Dhayalan Velauthapillai, G Ravi	<b>4.969</b>
	The electrochemical energy storage and photocatalytic performances analysis of rare earth metal (Tb and Y) doped SnO <sub>2</sub> @CuS composites	
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<b>230</b>	SP Keerthana, <b>R Yuvakkumar</b> , G Ravi, SI Hong, Abdullah G Al-Sehemi, Dhayalan Velauthapillai	<b>8.943</b>
	Fabrication of Ce doped TiO <sub>2</sub> for efficient organic pollutants removal from wastewater	
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<b>229</b>	S Swathi, <b>R Yuvakkumar</b> , G Ravi, Abdullah G Al-Sehemi, Dhayalan Velauthapillai	<b>3.423</b>
	Novel strontium vanadate nanostructures for hydrogen evolution reaction activity	
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<b>228</b>	SP Keerthana, <b>R Yuvakkumar</b> , G Ravi, Abdullah G Al-Sehemi, Dhayalan Velauthapillai	<b>14.224</b>
	Synthesis of pure and lanthanum-doped barium ferrite nanoparticles for efficient removal of toxic pollutants	
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<b>227</b>	S Swathi, <b>R Yuvakkumar</b> , P Senthil Kumar, G Ravi, M Thambidurai, Cuong Dang, Dhayalan Velauthapillai	<b>8.035</b>
	Gadolinium doped CeO <sub>2</sub> for efficient oxygen and hydrogen evolution reaction	
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<b>226</b>	M Karuppaiah, P Sakthivel, S Asaithambi, V Balaji, G Vijayaprasath, <b>R Yuvakkumar</b> , G Ravi	<b>5.532</b>
	In-situ deposition of amorphous Tungsten (VI) oxide thin-film for solid-state symmetric supercapacitor	
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<b>225</b>	S Swathi, <b>R Yuvakkumar</b> , P Senthil Kumar, G Ravi, D Nanthini, Dhayalan Velauthapillai	<b>8.035</b>
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<b>224</b>	G Ramalingam, C Maria Magdalane, B Arjun Kumar, <b>R Yuvakkumar</b> , G Ravi, A Irudaya Jothi, Naresh Kumar Rotte, G Murugadoss, Antony Ananth	<b>8.431</b>
	Enhanced visible light-driven photocatalytic performance of CdSe nanorods	
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<b>223</b>	V Thirumal, <b>R Yuvakkumar</b> , P Senthil Kumar, G Ravi, SP Keerthana, Dhayalan Velauthapillai	<b>8.943</b>
	Facile single-step synthesis of MXene@ CNTs hybrid nanocomposite by CVD method to remove hazardous pollutants	

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<b>222</b>	S Swathi, <b>R Yuvakkumar</b> , P Senthil Kumar, G Ravi, Dhayalan Velauthapillai	<b>8.035</b>
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<b>221</b>	V Thirumal, <b>R Yuvakkumar</b> , P Senthil Kumar, G Ravi, Dhayalan Velauthapillai	<b>6.206</b>
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<b>220</b>	SP Keerthana, <b>R Yuvakkumar</b> , P Senthil Kumar, G Ravi, SI Hong, Dhayalan Velauthapillai	<b>8.943</b>
	Investigation of pure and g-C <sub>3</sub> N <sub>4</sub> loaded CdWO <sub>4</sub> photocatalytic activity on reducing toxic pollutants	
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<b>219</b>	M Thambidurai, G Saranya, <b>R Yuvakkumar</b> , Cuong Dang	<b>3.423</b>
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<b>218</b>	V Thirumal, <b>R Yuvakkumar</b> , G Ravi, G Dineshkumar, M Ganesan, Saad H Alotaibi, Dhayalan Velauthapillai	<b>8.943</b>
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<b>217</b>	SP Keerthana, <b>R Yuvakkumar</b> , G Ravi, TS Senthil, Mehboobali Pannipara, Abdullah G Al-Sehemi, Dhayalan Velauthapillai	<b>3.869</b>
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<b>216</b>	K Dhamodharan, <b>R Yuvakkumar</b> , V Thirumal, G Ravi, M Isacfranklin, Sulaiman Ali Alharbi, Tahani Awad Alahmadi, Dhayalan Velauthapillai	<b>5.532</b>
	Effect of Nd <sup>3+</sup> doping on CdO nanoparticles for supercapacitor applications	
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<b>215</b>	S Swathi, <b>R Yuvakkumar</b> , P Senthil Kumar, G Ravi, Dhayalan Velauthapillai	<b>8.035</b>

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<b>214</b>	M Ramachandran, R Subadevi, P Rajkumar, R Muthupradeepa, <b>R Yuvakkumar</b> , M Sivakumar	<b>1.42</b>
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<b>213</b>	SP Keerthana, <b>R Yuvakkumar</b> , P Senthil Kumar, G Ravi, SI Hong, Dhayalan Velauthapillai	<b>8.943</b>
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<b>212</b>	S Swathi, <b>R Yuvakkumar</b> , P Senthilkumar, G Ravi, Dhayalan Velauthapillai	<b>7.139</b>
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<b>211</b>	S Swathi, <b>R Yuvakkumar</b> , P Senthil Kumar, G Ravi, Dhayalan Velauthapillai, Dai-Viet N Vo	<b>8.035</b>
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<b>210</b>	T Marimuthu, <b>R Yuvakkumar</b> , P Senthil Kumar, G Ravi, Xueqing Xu, Gang Xu, Dhayalan Velauthapillai	<b>7.139</b>
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<b>208</b>	S Swathi, <b>R Yuvakkumar</b> , P Senthil Kumar, G Ravi, Dhayalan Velauthapillai	<b>8.943</b>
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<b>204</b>	M Isacfranklin, <b>R Yuvakkumar</b> , P Senthil Kumar, V Thirumal, G Ravi, Dhayalan Velauthapillai	<b>6.206</b>
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<b>196</b>	T Marimuthu, <b>R Yuvakkumar</b> , P Senthil Kumar, G Ravi, Xueqing Xu, Dhayalan Velauthapillai, N Vo Dai Viet	<b>7.139</b>
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<b>192</b>	R Abirami, TS Senthil, SP Keerthana, <b>R Yuvakkumar</b> , G Ravi, Mehboobali Pannipara, Abdullah G Al-Sehemi	<b>5.532</b>
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<b>190</b>	Subramanian Keerthana, <b>Rathinam Yuvakkumar</b> , Ponnusamy Senthil Kumar, Ganesan Ravi, Dhayalan Velauthapillai, Dai-Viet Nguyen Vo	<b>5.190</b>
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<b>183</b>	Subramanian Keerthana, Balasubramanian Jansi Rani, <b>Rathinam Yuvakkumar</b> , Ganesan Ravi, Balasubramaniam Saravanakumar, Mehboobali Pannipara, Abdullah G Al-Sehemi, Dhayalan Velauthapillai	<b>8.431</b>
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<b>164</b>	S Swathi, <b>R Yuvakkumar</b> , G Ravi, E Sunil Babu, Dhayalan Velauthapillai, Sulaiman Ali Alharbi	<b>5.532</b>
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<b>163</b>	SP Keerthana, B Jansi Rani, <b>R Yuvakkumar</b> , G Ravi, Yohi Shivatharsiny, E Sunil Babu, Hesham S Almoallim, Sulaiman Ali Alharbi, Dhayalan Velauthapillai	<b>7.139</b>
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<b>162</b>	S Asaithambi, P Sakthivel, M Karuppaiah, K Balamurugan, <b>R Yuvakkumar</b> , M Thambidurai, G Ravi	<b>6.371</b>
	Synthesis and characterization of various transition metals doped SnO <sub>2</sub> @ MoS <sub>2</sub> composites for supercapacitor and photocatalytic applications	
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<b>161</b>	B Jansi Rani, SP Keerthana, <b>R Yuvakkumar</b> , G Ravi, Dhayalan Velauthapillai, Yohi Shivatharsiny, E Sunil Babu, Hesham S Almoallim, Sulaiman Ali Alhar	<b>7.139</b>
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<b>160</b>	M Isacfranklin, <b>R Yuvakkumar</b> , G Ravi, P Kumar, B Saravanakumar, Dhayalan Velauthapillai, Tahani Awad Alahmadi, Sulaiman Ali Alharbi	<b>3.869</b>
	Biomedical application of single anatase phase TiO <sub>2</sub> nanoparticles with addition of Rambutan (Nephelium lappaceum L.) fruit peel extract	
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<b>159</b>	M Isacfranklin, <b>R Yuvakkumar</b> , G Ravi, SI Hong, Dhayalan Velauthapillai, M Thambidurai, Cuong Dang, Tahani Saad Algarni, Amal M Al-Mohaimeed	<b>11.307</b>
	Heterostructured SmCoO <sub>3</sub> /rGO composite for high-energy hybrid supercapacitors	
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<b>158</b>	S Swathi, <b>R Yuvakkumar</b> , G Ravi, SI Hong, Dhayalan Velauthapillai, M Thambidurai, Cuong Dang, Amal M Al-Mohaimeed, Wedad A Al-onazi	<b>7.139</b>
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<b>157</b>	M Sangeetha Vidhya, Fuad Ameen, Turki Dawoud, <b>R Yuvakkumar</b> , G Ravi, P Kumar, Dhayalan Velauthapillai	<b>3.574</b>
	Anti-cancer applications of Zr, Co, Ni-doped ZnO thin nanoplates	
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<b>156</b>	S Asaithambi, P Sakthivel, M Karuppaiah, V Balaji, <b>R Yuvakkumar</b> , Dhayalan Velauthapillai, G Ravi	<b>3.925</b>
	Facile synthesis of a heterostructured lanthanum-doped SnO <sub>2</sub> anchored with rGO for asymmetric supercapacitors and photocatalytic dye degradation	
	New Journal of Chemistry, 45, 22497-22513, 2021	

<b>155</b>	M Sangeethavidhya, <b>Rathinam Yuvakkumar</b> , Ganesan Ravi, Saravanakumar Balasubramaniam, Dhayalan Velauthapillai	<b>5.598</b>
	Asymmetric polyhedron structured NiSe <sub>2</sub> @ MoSe <sub>2</sub> device for supercapacitor	
	Nanoscale Advances, 2021	
<b>154</b>	M Isacfranklin, <b>R Yuvakkumar</b> , G Ravi, Dhayalan Velauthapillai, Mehboobali Pannipara, Abdullah G Al-Sehemi	<b>5.598</b>
	Superior supercapacitive performance of Cu <sub>2</sub> MnSnS <sub>4</sub> asymmetric devices	
	Nanoscale Advances, 3, 486-498, 2020	
<b>153</b>	S Swathi, <b>R Yuvakkumar</b> , G Ravi, SI Hong, E Sunil Babu, Dhayalan Velauthapillai, Tahani Saad Algarni, Amal M Al-Mohaimed	<b>2.856</b>
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<b>152</b>	B Jansi Rani, A Anusiya, G Ravi, R Yuvakkumar	-
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<b>151</b>	B Jansi Rani, <b>R Yuvakkumar</b> , G Ravi, P Kumar, E Sunil Babu, B Saravanakumar, Dhayalan Velauthapillai	<b>3.574</b>
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<b>150</b>	M Isacfranklin, C Deepika, G Ravi, <b>R Yuvakkumar</b> , Dhayalan Velauthapillai, B Saravanakumar	<b>5.532</b>
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<b>149</b>	R Muthupradeepa, M Sivakumar, R Subadevi, V Suriyanarayanan, M Ramachandran, P Rajkumar, <b>R Yuvakkumar</b>	<b>2.779</b>
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<b>148</b>	M Karuppaiah, P Sakthivel, S Asaithambi, L Krishna Bharat, Goli Nagaraju, Tansir Ahamad, K Balamurugan, <b>R Yuvakkumar</b> , G Ravi	<b>7.336</b>
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<b>147</b>	R Shobana, B Saravanakumar, G Ravi, V Ganesh, <b>R Yuvakkumar</b>	<b>1.698</b>
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<b>146</b>	M Sangeetha Vidhya, G Ravi, <b>R Yuvakkumar</b> , M Thambidurai, Cuong Dang, Mehboobali Pannipara, Abdullah G Al-Sehemi, Dhayalan Velauthapillai	<b>3.574</b>
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<b>145</b>	M Isacfranklin, <b>R Yuvakkumar</b> , Ganesan Ravi, SI Hong, Foo Shini, M Thambidurai, Cuong Dang, Dhayalan Velauthapillai	<b>4.379</b>
	Marigold flower like structured Cu <sub>2</sub> NiSnS <sub>4</sub> electrode for high energy asymmetric solid state supercapacitors	
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<b>144</b>	Srinivasan Swathi, <b>Rathinam Yuvakkumar</b> , Ganesan Ravi, Eadi Sunil Babu, Dhayalan Velauthapillai, Asad Syed, Turki MS Dawoud	<b>3.869</b>
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<b>143</b>	B Jansi Rani, G Ravi, <b>R Yuvakkumar</b> , Dhayalan Velauthapillai, B Saravanakumar, Amal M Al-Mohaimed	<b>3.869</b>
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<b>142</b>	M Isacfranklin, Turki Dawoud, Fuad Ameen, G Ravi, <b>R Yuvakkumar</b> , P Kumar, SI Hong, Dhayalan Velauthapillai, B Saravanakumar	<b>5.532</b>
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<b>141</b>	B Jansi Rani, A Anusiya, G Ravi, <b>R Yuvakkumar</b>	-

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<b>137</b>	S Swathi, G Ravi, <b>R Yuvakkumar</b> , SI Hong, E Sunil Babu, Dhayalan Velauthapillai, P Kumar	<b>5.532</b>
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<b>135</b>	S Swathi, B Jansi Rani, G Ravi, <b>R Yuvakkumar</b> , SI Hong, Dhayalan Velauthapillai, B Saravanakumar, M Thambidurai, Cuong Dang	<b>4.383</b>
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<b>127</b>	S Swathi, Fuad Ameen, G Ravi, <b>R Yuvakkumar</b> , SI Hong, Dhayalan Velauthapillai,	<b>2.856</b>

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<b>94</b>	BJ Rani, M Praveenkumar, S Ravichandran, V Ganesh, RK Guduru, <b>R Yuvakkumar</b>	<b>4.537</b>
	Ultrafine M-doped TiO <sub>2</sub> (M= Fe, Ce, La) nanosphere photoanodes for photoelectrochemical water-splitting applications	
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<b>93</b>	B. Saravanakumar, G. Ravi, V. Ganesh, S. Ravichandran, A. Sakunthala, <b>R Yuvakkumar</b>	<b>1.354</b>
	Low surface energy and pH effect on SnO <sub>2</sub> nanoparticles formation for supercapacitor applications	
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<b>92</b>	P Sakthivel, S Asaithambi, M Karuppaiah, S Sheikfareed, <b>R Yuvakkumar</b> , G. Ravi	<b>2.779</b>
	Different rare earth (Sm, La, Nd) doped magnetron sputtered CdO thin films for optoelectronic applications	
	Journal of Materials Science: Materials in Electronics 30, 9999-10012, 2019	
<b>91</b>	M Karuppaiah, P Sakthivel, S Asaithambi, R Murugan, <b>R Yuvakkumar</b> , G Ravi	<b>4.778</b>
	Formation of one dimensional nanorods with microsphere of MnCO <sub>3</sub> using Ag as dopant to enhance the performance of pseudocapacitors	
	Materials Chemistry and Physics, 228, 1-8, 2020	
<b>90</b>	S Asaithambi, P Sakthivel, M Karuppaiah, R Murugan, <b>R Yuvakkumar</b> , G. Ravi	<b>2.047</b>
	Preparation of SnO <sub>2</sub> Nanoparticles with Addition of Co Ions for Photocatalytic Activity of Brilliant Green Dye Degradation	
	Journal of Electronic Materials 48, 2183-2194, 2019	
<b>89</b>	B Saravanakumar, G Ravi, <b>R Yuvakkumar</b> , V Ganesh, RK Guduru	<b>4.644</b>
	Synthesis of polyoxometalates, copper molybdate (Cu <sub>3</sub> Mo <sub>2</sub> O <sub>9</sub> ) nanopowders, for energy storage applications	
	Materials Science in Semiconductor Processing 93, 164-172, 2019	



<b>88</b>	B Saravanakumar, G Ravi, V Ganesh, RK Guduru, <b>R Yuvakkumar</b>	<b>7.63</b>
	MnCo <sub>2</sub> O <sub>4</sub> nanosphere synthesis for electrochemical applications	
	Materials Science for Energy Technologies 2, 130-138, 2019	
<b>87</b>	BJ Rani, G Ravi, <b>R Yuvakkumar</b> , S Ravichandran, F Ameen, S AlNadhary	<b>8.634</b>
	Sn doped $\alpha$ -Fe <sub>2</sub> O <sub>3</sub> (Sn= 0, 10, 20, 30 wt%) photoanodes for photoelectrochemical water splitting applications	
	Renewable Energy 133, 566-574, 2019	
<b>86</b>	BJ Rani, MP Kumar, G Ravi, S Ravichandran, RK Guduru, <b>R Yuvakkumar</b>	<b>7.392</b>
	Electrochemical and photoelectrochemical water oxidation of solvothermally synthesized Zr-doped $\alpha$ -Fe <sub>2</sub> O <sub>3</sub> nanostructures	
	Applied Surface Science 471, 733-744, 2019	
<b>85</b>	Balasubramanian Jansi Rani, Ganesan Ravi, <b>Rathinam Yuvakkumar</b> , M. Praveenkumar, Subbiah Ravichandran, Paulpandian Muthu Mareeswaran, Sun Ig Hong	<b>4.132</b>
	Bi <sub>2</sub> WO <sub>6</sub> and FeWO <sub>4</sub> Nanocatalysts for the Electrochemical Water Oxidation Process	
	ACS Omega 4, 10302-10310, 2019	
<b>84</b>	B Jansi Rani, M Praveen Kumar, G Ravi, S Ravichandran, Ramesh K Guduru, <b>R Yuvakkumar</b>	<b>7.392</b>
	Electrochemical and photoelectrochemical water oxidation of solvothermally synthesized Zr-doped $\alpha$ -Fe <sub>2</sub> O <sub>3</sub> nanostructures	
	Applied Surface Science, 471, 733-744, 2019	
<b>83</b>	M Karuppaiah, P Sakthivel, S Asaithambi, R Murugan, <b>R Yuvakkumar</b> , G Ravi	<b>5.532</b>
	Solvent dependent morphological modification of micro-nano assembled Mn <sub>2</sub> O <sub>3</sub> /NiO composites for high performance supercapacitor applications	
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<b>82</b>	B. Jansi Rani, G. Ravi, <b>R. Yuvakkumar</b> , S. Ravichandran, Fuad Ameen, A. Al-Sabri	<b>2.606</b>
	Efficient, highly stable Zn-doped NiO nanocluster electrocatalysts for electrochemical water splitting applications	
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<b>81</b>	B. Saravanakumar, T. Priyadharshini, G. Ravi, V. Ganesh, A. Sakunthala, <b>R. Yuvakkumar</b>	<b>2.961</b>
	Hydrothermal synthesis and electrochemical properties of ZnCo <sub>2</sub> O <sub>4</sub> nanospheres	
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<b>80</b>	B Saravanakumar, SP Ramachandran, G Ravi, V Ganesh, A Sakunthala, <b>R Yuvakkumar</b>	<b>2.983</b>
	Transition mixed-metal molybdates ( $MnMoO_4$ ) as an electrode for energy storage applications	
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<b>79</b>	BJ Rani, A Anusiya, M Praveenkumar, S Ravichandran, RK Guduru, <b>R. Yuvakkumar</b>	<b>2.779</b>
	Ag implanted ZnO hierarchical nanoflowers for photoelectrochemical water-splitting applications	
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<b>78</b>	A Anusiya, BJ Rani, G Ravi, <b>R Yuvakkumar</b> , S Ravichandran, V Ganesh,	<b>2.597</b>
	Transition-Metal Element (Ni, Co)-Doped MgO Microflowers for Electrochemical Biosensor Applications	
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<b>77</b>	Ponnuchamy Kumar, Rathinam Yuvakkumar, Sekar Vijayakumar, Baskaralingam Vaseeharan	<b>4.778</b>
	Cytotoxicity of phloroglucinol engineered silver (Ag) nanoparticles against MCF-7 breast cancer cell lines	
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<b>76</b>	B Saravanakumar, SP Ramachandran, G Ravi, V Ganesh, S Ravichandran, P Muthu Mareeswaran, <b>R Yuvakkumar</b>	<b>2.961</b>
	Enhanced pseudocapacitive performance of $SnO_2$ , $Zn-SnO_2$ , and $Ag-SnO_2$ nanoparticles	
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<b>75</b>	B. Saravanakumar, R. Shobana, G. Ravi, V. Ganesh, <b>R. Yuvakkumar</b>	<b>2.047</b>
	Pseudocapacitive NiO/NiSnO <sub>3</sub> electrode for supercapacitor applications	
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<b>74</b>	Sami AlYahya, B. Jansi Rani, G. Ravi, <b>R. Yuvakkumar</b> , A. Arun, Fuad Ameen, S. AlNadhary	<b>2.779</b>
	Size dependent magnetic and antibacterial properties of solvothermally synthesized cuprous oxide ( $Cu_2O$ ) nanocubes	
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<b>73</b>	R. Uma Maheswari, B. Jansi Rani, G. Ravi, <b>R. Yuvakkumar</b> , Fuad Ameen, A. Al-sabri	<b>2.606</b>
	Structural, morphological, optical and antibacterial properties of pentagon CuO nanoplatelets	

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<b>72</b>	B. Jansi Rani, B. Saravanakumar, G. Ravi, A. Sakunthala, <b>R. Yuvakkumar</b>	<b>2.983</b>
	Pure and cobalt substituted zinc ferrite magnetic ceramics for super capacitor application	
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<b>71</b>	Eadi Sunil Babu, B. Jansi Rani, G. Ravi, <b>R. Yuvakkumar</b> , Ramesh K. Guduru, S. Ravichandran, Faud Ameen, Sungjin Kim, Heung Woo Jeon	<b>3.574</b>
	Vertically aligned Cu-ZnO nanorod arrays for water splitting applications	
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<b>70</b>	B. Jansi Rani, B. Saravanakumar, G. Ravi, A. Sakunthala, <b>R. Yuvakkumar</b>	<b>1.354</b>
	Structural, optical and magnetic properties of NiO nanopowders	
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<b>69</b>	B.C.M.A. Ashwin, G. Sivaraman, T. Stalin, <b>R. Yuvakkumar</b> , P. Muthu Mareeswaran	<b>6.814</b>
	Selective and sensitive fluorescent sensor for Pd <sup>2+</sup> using coumarin 460 for real-time and biological applications	
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<b>68</b>	B Saravanakumar, G Ravi, V Ganesh, Fuad Ameen, A Al-Sabri, <b>R Yuvakkumar</b>	<b>2.606</b>
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<b>67</b>	B. Jansi Rani, G. Ravi, S. Ravichandran, V. Ganesh, Fuad Ameen, A. Al-Sabri, <b>R. Yuvakkumar</b>	<b>3.869</b>
	Electrochemically active XWO <sub>4</sub> (X=Co, Cu, Mn, Zn) nanostructure for water splitting applications	
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<b>66</b>	Eadi Sunil Babu, B. Jansi Rani, G. Ravi, <b>R. Yuvakkumar</b> , Ramesh K. Guduru, V. Ganesh, Sungjin Kim	<b>3.574</b>
	Novel NiWO <sub>4</sub> nanoberries morphology effect on photoelectrochemical properties	
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<b>65</b>	B. Jansi Rani, M. Ravina, G. Ravi, S. Ravichandran, V. Ganesh, <b>R. Yuvakkumar</b>	<b>6.137</b>
	Synthesis and characterization of Hausmannite (Mn <sub>3</sub> O <sub>4</sub> ) nanostructures	
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<b>64</b>	T. Priyadharshini, B. Saravanakumar, G. Ravi, A. Sakunthala, <b>R. Yuvakkumar</b>	<b>1.354</b>
	Hexamine role on pseudocapacitive behaviour of cobalt oxide (Co <sub>3</sub> O <sub>4</sub> ) nanopowders	
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<b>63</b>	P. Vishnukumar, B. Saravanakumar, G. Ravi, V. Ganesh, Ramesh K. Guduru, <b>R. Yuvakkumar</b>	<b>3.574</b>
	Synthesis and Characterization of NiO/Ni <sub>3</sub> V <sub>2</sub> O <sub>8</sub> Nanocomposite for Supercapacitor Applications	
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<b>62</b>	B. Jansi Rani, M. Ravina, G. Ravi, V. Ganesh, S. Ravichandran, <b>R. Yuvakkumar</b>	<b>5.454</b>
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<b>61</b>	Eadi Sunil Babu; B Saravanakumar; G Ravi; <b>R Yuvakkumar</b> ; V Ganesh; Ramesh K. Guduru; Sungjin Kim	<b>2.779</b>
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<b>60</b>	B. Jansi Rani, B. Saravanakumar, G. Ravi, V. Ganesh, S. Ravichandran, <b>R. Yuvakkumar</b>	<b>2.779</b>
	Structural, optical and magnetic properties of CuFe <sub>2</sub> O <sub>4</sub> nanoparticles	
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<b>59</b>	B Saravanakumar, S P Ramachandran, G Ravi, V Ganesh, Ramesh K Guduru and <b>R Yuvakkumar</b>	<b>2.025</b>
	Electrochemical characterization of FeMnO <sub>3</sub> microspheres as potential material for energy storage applications	
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<b>58</b>	B. Jansi Rani, M. Durga, G. Ravi, P. Krishnaveni, V. Ganesh, S. Ravichandran, <b>R. Yuvakkumar</b>	<b>2.983</b>
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<b>57</b>	<b>R. Yuvakkumar</b> , Jae Sook Song, Sun Ig Hong	<b>0.32</b>
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<b>20</b>	R. Suriyaprabha, G. Karunakaran, M. Prabhu, <b>R. Yuvakkumar</b> , V. Rajendran, N. Kannan	<b>4.036</b>
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<b>19</b>	A. Karthik, P. Manivasakan, S. Arunmetha, <b>R. Yuvakkumar</b> , V. Rajendran	<b>1.968</b>
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<b>18</b>	S. R. Srither, M. Selvam, S. Arunmetha, <b>R. Yuvakkumar</b> , K. Saminathan, V. Rajendran	<b>1.474</b>
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<b>17</b>	G. Karunakaran, R. Suriyaprabha, P. Manivasakan, <b>R. Yuvakkumar</b> , V. Rajendran, P. Prabu, N. Kannan	<b>2.050</b>
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<b>16</b>	S. Venkateshwaran, <b>R. Yuvakkumar</b> , V. Rajendran	<b>1.082</b>

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<b>14</b>	N. R. Dhineshababu, P. Manivasakan, <b>R. Yuvakkumar</b> , P. Prabu, V. Rajendran	<b>1.354</b>
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<b>13</b>	S. Ezhaveni, <b>R. Yuvakkumar</b> , M. Rajkumar, N. Meenakshi Sundaram, V. Rajendran	<b>1.354</b>
	Preparation and characterization of nano-hydroxyapatite material for liver cancer cell treatment	
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<b>12</b>	G. Karunakaran, R. Suriyaprabha, P. Manivasakan, <b>R. Yuvakkumar</b> , V. Rajendran, N. Kannan	<b>1.354</b>
	Impact of Nano and Bulk ZrO <sub>2</sub> , TiO <sub>2</sub> Particles on Soil Nutrient Contents and PGPR	
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<b>11</b>	S. Sutha, <b>R. Yuvakkumar</b> , V. Rajendran, R. Palanivelu	<b>3.574</b>
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<b>10</b>	K. Saravanan, <b>R. Yuvakkumar</b> , V. Rajendran, P. Paramasivam	<b>1.452</b>
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<b>9</b>	R. Suriyaprabha, G. Karunakaran, <b>R. Yuvakkumar</b> , V. Rajendran, N. Kannan	<b>1.824</b>
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<b>8</b>	R. Suriyaprabha, G. Karunakaran, <b>R. Yuvakkumar</b> , P. Prabu, V. Rajendran, N. Kannan	<b>2.533</b>
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	Influence of Nanosilica Powder on the Growth of Maize Crop ( <i>Zea Mays L.</i> )	
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3	<b>R. Yuvakkumar</b> , V. Elango, V. Rajendran, N. Kannan	<b>1.716</b>
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<b>2009</b>		
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24	S Swathi, B Jansi Rani, G Ravi, <b>R Yuvakkumar</b> , P Kumar, Dhayalan Velauthapillai, B Saravanakumar, E Sunil Babu	
	Electrochemical Performance of NiS@ CuS for water oxidation	
	AIP Conference Proceedings, 2270, 110028, 2020	
23	M Sangeetha Vidhya, G Ravi, <b>R Yuvakkumar</b> , P Kumar, Dhayalan Velauthapillai, B Saravanakumar, E Sunil Babu	
	Cu <sub>2</sub> S electrochemical energy storage applications	
	AIP Conference Proceedings, 2270, 100011, 2020	
22	M Isacfranklin, G Ravi, <b>R Yuvakkumar</b> , P Kumar, Dhayalan Velauthapillai, B Saravanakumar, E Sunil Babu	
	Cerium doped NiO nanoparticles by hydrothermal method	
	AIP Conference Proceedings, 2270, 110022, 2020	
21	B Jansi Rani, G Ravi, <b>R Yuvakkumar</b> , Dhayalan Velauthapillai, B Saravanakumar, E Sunil Babu	
	NiWO <sub>4</sub> @Ni(OH) <sub>2</sub> for electrochemical water splitting	
	AIP Conference Proceedings, 2270, 110033, 2020	
20	M Isacfranklin, G Ravi, <b>R Yuvakkumar</b> , P Kumar, Dhayalan Velauthapillai, B Saravanakumar, E Sunil Babu	
	Vanadium oxide nanostructures for electrochemical supercapacitor applications	
	AIP Conference Proceedings, 2270, 110032, 2020	
19	SP Keerthana, B Jansi Rani, G Ravi, <b>R Yuvakkumar</b> , Dhayalan Velauthapillai, B Saravanakumar, E Sunil Babu	
	Electrochemical water splitting of Ag-WO <sub>3</sub> nanostructures	
	AIP Conference Proceedings, 2270, 110031, 2020	
18	M Sangeetha Vidhya, B Jansi Rani, G Ravi, <b>R Yuvakkumar</b>	
	Hydrothermal synthesis of Bare and Ni doped CdO nanostructures for antibacterial applications	
	AIP Conference Proceedings, 2270, 030091, 2020	
17	S Swathi, B Jansi Rani, G Ravi, <b>R Yuvakkumar</b>	
	Synthesis of mixed phase MoO <sub>3</sub> /Mo <sub>5</sub> O <sub>14</sub> nanostructures for hydrogen evolution reaction (HER) via electrochemical water splitting	

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<b>16</b>	B Jansi Rani, G Ravi, <b>R Yuvakkumar</b>	
	Solvothermal optimization of V <sub>2</sub> O <sub>5</sub> nanostructures for electrochemical energy production	
	AIP Conference Proceedings, 2270, 030619, 2020	
<b>15</b>	S. Swathi, B. Jansi Rani, G. Ravi, <b>R. Yuvakkumar</b>	
	Dopant influence on phase and electrochemical performance of molybdenum sulfide nanostructures	
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<b>14</b>	BJ Rani, A Anusiya, G Ravi, <b>R Yuvakkumar</b>	
	Multi-phase CuBi <sub>2</sub> O <sub>4</sub> @CuO@ $\alpha$ -Bi <sub>2</sub> O <sub>3</sub> nanocomposite electrocatalyst for electrochemical water splitting application	
	AIP Conference Proceedings 2115 (1), 030573	
<b>13</b>	B Saravanakumar, C Selvam, G Ravi, M Thambidurai, <b>R Yuvakkumar</b>	
	Role of NaOH concentration on synthesis and characterization of $\beta$ -V <sub>2</sub> O <sub>5</sub> nanorods by solvothermal method	
	AIP Conference Proceedings 1992 (1), 040028, 2018	
<b>12</b>	BJ Rani, SP Raj, G Ravi, <b>R Yuvakkumar</b>	
	Surfactant free SnO <sub>2</sub> nanoplate array synthesis for supercapacitor applications	
	AIP Conference Proceedings 1992 (1), 030007, 2018	
<b>11</b>	B. Saravanakumar, A. Anusiya, B. Jansi Rani, G. Ravi, <b>R. Yuvakkumar</b>	
	Role of different chelating agent in synthesis of copper doped tin oxide (Cu-SnO <sub>2</sub> ) nanoparticles	
	AIP Conference Proceedings 1953, 030192 (2018)	
<b>10</b>	R. Shobana, B. Saravanakumar, G. Ravi, <b>R. Yuvakkumar</b>	
	Effect of CTAB concentration on synthesis of nickel doped manganese oxide nanoparticles	
	AIP Conference Proceedings 1953, 030167 (2018); <a href="https://doi.org/10.1063/1.5032502">https://doi.org/10.1063/1.5032502</a>	
<b>9</b>	B. Jansi Rani, B. Saravanakumar, G. Ravi, <b>R. Yuvakkumar</b>	
	Facile synthesis of SnO <sub>2</sub> / $\alpha$ -Fe <sub>2</sub> O <sub>3</sub> nanocomposite for supercapacitor capacitor applications	
	AIP Conference Proceedings 1953, 030111 (2018)	
<b>8</b>	<b>R. Yuvakkumar</b> , S. I. Hong,	
	Baddeleyite Type Monoclinic Zirconium Oxide Nanocrystals Formation	

	Advanced Materials Research, 1102, 79-82, 2015	
7	J. Suresh, <b>R. Yuvakkumar</b> , M. Sundrarajan, S.I. Hong	
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6	A. Joseph Nathanael, <b>R. Yuvakkumar</b> , Tae Hwan Oh, S.I. Hong	
	High Aspect Ratio Hydroxyapatite Nanorods Formed by Polymer Assisted Synthesis	
	Applied Mechanics and Materials Vol. 508, pp. 52-55, 2014	
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	Antibacterial and wash durability properties of untreated and treated cotton fabric using MgO and NiO nanoparticles	
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4	<b>R. Yuvakkumar</b> , J. Suresh, and S.I. Hong	
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3	<b>R. Yuvakkumar</b> , J. Suresh, A. Joseph Nathanael, M. Sundrarajan, S.I. Hong	
	A comparative study on antibacterial and wash durability behaviour of ZnO and CuO nanoparticles treated cotton fabric using sodium alginate as cross linker	
	Applied Mechanics and Materials Vol. 508, pp. 44-47, 2014	
2	<b>R. Yuvakkumar</b> , J. Suresh, S.I. Hong	
	Green synthesis of spinel magnetite iron oxide nanoparticles	
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1	R. Suriyaprabha, G. Karunakaran, <b>R. Yuvakkumar</b> , P. Prabu, V. Rajendran	
	Application of silica nanoparticles for increased silica availability in maize	
	SOLID STATE PHYSICS: Proceedings of the 57th DAE Solid State Physics Symposium 2012, AIP Conf. Proc. 1512, 424-425, 2013	

### **Journals with ISSN/ISBN**

<b>S. No</b>	<b>Title of the Article</b>	<b>Author(s)</b>	<b>Name of the journal Vol. No. &amp; Page</b>	<b>International / National</b>	<b>ISBN / ISSN</b>
1.	A Comparison study of two Indium free alternative	P. Sakthivel, R. Murugan, S. Asaithambi, M. Karuppaiah,	International Journal of Advance Engineering and Research Development Volume 5,	I	2348 - 6406

	Cadmium based TCO thin films for optoelectronic applications	<b>R.Yuvakkumar</b> and G.Ravi	Special Issue 07, April- <b>2018</b>		
2.	Rapid microwave assisted synthesis of Mn <sub>2</sub> O <sub>3</sub> and Co <sub>3</sub> O <sub>4</sub> nanoparticles and their structural, optical and magnetic properties	M. Karuppaiah, R. Murugan, P. Sakthivel, S. Asaithambi, <b>R.Yuvakkumar</b> and G.Ravi	International Journal of Advance Engineering and Research Development Volume 5, Special Issue 07, April- <b>2018</b>	I	2348 - 6406
3.	Effect of annealing temperature on physical properties of tin oxide nanoparticles by microwave assisted route	S. Asaithambi, R. Murugan, P. Sakthivel, M. Karuppaiah, <b>R. Yuvakkumar</b> and G.Ravi	International Journal of Advance Engineering and Research Development Volume 5, Special Issue 07, April- <b>2018</b>	I	2348 - 6406
4.	Synthesis and characterization of ZnO Nanoflowers	A. Anusiya, B. Jansi Rani, G. Ravi, <b>R. Yuvakkumar</b>	International Journal of Advance Engineering and Research Development Volume 5, Special Issue 07, April- <b>2018</b>	I	2348 - 6406
5.	Synthesis and Characterization of $\gamma$ -Bi <sub>2</sub> O <sub>3</sub> Nanorods	B. Jansi Rani, G. Ravi, <b>R. Yuvakkumar</b>	International Journal of Advance Engineering and Research Development Volume 5, Special Issue 07, April- <b>2018</b>	I	2348 - 6406

## Events Participated

### Conferences / Seminars / Workshops:

1. **R Yuvakkumar** "One-day National level workshop on Patenting and Collaborations with Industries" organized by Industry and Consultancy wing &

- University Business Collaboration Centre, Alagappa University, Karaikudi. (30th January 2023).
2. SP Keerthana, **R Yuvakkumar\***, G Ravi, Sr doped TiO<sub>2</sub> photocatalyst for removal of basic dye from textile wastewater, 2<sup>nd</sup> International Conference on Multifunctional Materials, Geethanjali College of Engineering and Technology, Keesara, Telangana, India. (22-24, December 2022).
  3. P. Mohana, **R Yuvakkumar\***, G Ravi, Preparation of Co<sub>3</sub>O<sub>4</sub>/g-C<sub>3</sub>N<sub>4</sub> nanocomposite to enrich electrochemical water splitting, 2<sup>nd</sup> International Conference on Multifunctional Materials, Geethanjali College of Engineering and Technology, Keesara, Telangana, India. (22-24, December 2022).
  4. SP Keerthana, **R Yuvakkumar\***, P Senthil kumar, G Ravi, Dhayalan Velauthapillai, Pure and La-doped Barium ferrite nanoparticles for efficient removal of toxic pollutants, Recent Trends in Clean Technologies for Sustainable Environment (CTSE-2021), SSN College of Engineering, Chennai, (6-7, May 2021)
  5. SP Keerthana, **R Yuvakkumar\***, P Senthil kumar, G Ravi, Dhayalan Velauthapillai, Nd-doped ZrO<sub>2</sub> Photocatalyst for degradation of organic pollutants in wastewater, Recent Trends in Clean Technologies for Sustainable Environment (CTSE-2021), SSN College of Engineering, Chennai, (6-7, May 2021)
  6. SP Keerthana, G Ravi, **R Yuvakkumar\***, Nickel Iron Oxide Electrocatalysts for Electrochemical Water Splitting Activity, International Conference on Nanoscience and Nanotechnology (ICONN-2021), SRM Institute of Science and Technology, Kattankulathur, (01-03, February 2021)
  7. SP Keerthana, **R Yuvakkumar\***, P Senthil kumar, G Ravi, Dhayalan Velauthapillai, Pure and La-doped Barium ferrite nanoparticles for efficient removal of toxic pollutants, Recent Trends in Clean Technologies for Sustainable Environment (CTSE-2021), SSN College of Engineering, Chennai, (6-7, May 2021)
  8. SP. Keerthana, **R. Yuvakkumar\***, G. Ravi\*, DhayalanVelauthapillai<sup>b\*</sup>, Synthesis and characterization of photocatalytic active materials, Technological Advances in Science, Medicine and Engineering (TASME), Canada (3-5, July 2021)
  9. SP. Keerthana, , G. Ravi\*, **R. Yuvakkumar\***, Surfactant influence on Copper molybdate nanoflakes for water oxidation, International virtual conference of Recent Trends in Energy Materials (INCRTEM), Alagappa University, Karaikudi. (9-11, September 2020)
  10. S Swathi, **R Yuvakkumar\***, P Senthil kumar, G Ravi, Dhayalan Velauthapillai, Gadolinium doped CeO<sub>2</sub> for efficient hydrogen evolution reaction, Recent Trends in Clean Technologies for Sustainable Environment (CTSE-2021), SSN College of Engineering, Chennai, (6-7, May 2021)



11. S Swathi, **R Yuvakkumar\***, P Senthil kumar, G Ravi, Dhayalan Velauthapillai, HMT concentration effect on  $\text{CaWO}_4$  nanostructures for electrochemical HER activity, Recent Trends in Clean Technologies for Sustainable Environment (CTSE-2021), SSN College of Engineering, Chennai, (6-7, May 2021)
12. S Swathi, G Ravi, **R Yuvakkumar\***, Electrochemical Behavior of Ethylene Glycol mediated Manganese carbonate nanostructures, International virtual conference of Recent Trends in Energy Materials (INCRTEM), Alagappa University, Karaikudi. (9-11, September 2020)
13. S Swathi, B Jansi Rani, G Ravi, **R Yuvakkumar\***, P Kumar, Dhayalan Velauthapillai, B Saravanakumar, E Sunil Babu, Electrochemical Performance of  $\text{NiS@CuS}$  for water oxidation, International conference on Physics and Chemistry of Materials in Novel Engineering Applications (PCMNEA'20), Kumaraguru college of technology, Coimbatore (6,7, February 2020)
14. S Swathi, B Jansi Rani, G Ravi, **R Yuvakkumar\***, Synthesis of mixed phase  $\text{MoO}_3/\text{Mo}_5\text{O}_{14}$  nanostructures for hydrogen evolution reaction (HER) via electrochemical water splitting, 63<sup>th</sup> DAE-Solid State Physics Symposium 2019, DAE convention centre, Bhabha Atomic Research Centre, Mumbai
15. S. Swathi, G. Ravi, **R. Yuvakkumar\***, CTAB cationic surfactant assisted  $\text{NiCo}_3$  electrocatalyst for electrochemical water splitting applications, International Conference on Nanoscience and Nanotechnology (ICONN-2021), SRM SRM Institute of Science and Technology, Kattankulathur, (01-03, February 2021)
16. S Swathi, B Jansi Rani, G Ravi, R Yuvakkumar, Dopant influence on phase and electrochemical performance of Molybdenum sulfide nanostructures, International Conference on Advanced Materials (ICAM-2019), Nirmalagiri college, Kannur, Kerala, India (12-14, June, 2019)
17. M. Isacfranklin<sup>a</sup>, S. Asaithambi <sup>a</sup>, **R. Yuvakkumar\***, G. Ravi\*, DhayalanVelauthapillai<sup>b\*</sup>, Role of carbon in quaternary metal sulfide electrodes for supercapacitor applications: A review, Technological Advances in Science, Medicine and Engineering (TASME), Canada (3-5, July 2021)
18. M. Isacfranklin, G. Ravi, **R. Yuvakkumar\***, Photoelectrochemical Hydrogen Production, HVL Hydrogen Webinar, Western Norway University of Applied Sciences, Bergen, Norway (11 June 2021)
19. M. Isacfranklin, G. Ravi, **R. Yuvakkumar\***, 3D Flower like morphology for energy storage applications, International Virtual Conference on Recent Trends in Energy Materials (INCRTEM-2020), Alagappa University, Karaikudi. (9-11 September 2020)
20. M Isacfranklin, G Ravi, **R Yuvakkumar\***,  $\text{CuCo}_2\text{O}_4$  electrodes for supercapacitor applications, International Conference on Nanoscience and Nanotechnology (ICONN-2021), SRM SRM Institute of Science and Technology, Kattankulathur, (01-03, February 2021)

21. M Sangeetha Vidhya, G Ravi, **R Yuvakkumar\***, Hydrothermal synthesis of ternary metal selenide as a superior electrode material for supercapacitor applications, International Conference on Nanoscience and Nanotechnology (ICONN-2021), SRM SRM Institute of Science and Technology, Kattankulathur, (01-03, February 2021)
22. B. Saravanakumar, B. Jansi Rani, G. Ravi, **R. Yuvakkumar\***, Synthesis and characterization of SnO<sub>2</sub>, Zn-SnO<sub>2</sub> & Ag-SnO<sub>2</sub> as a pseudocapacitor electrode. International Symposium on Nanomaterials for Clean Energy and Health Applications (ISNCHA-2017), Coimbatore Institute of Technology (CIT)-Coimbatore. (6-8 December 2017)
23. B. Saravanakumar, R.Shobana G. Ravi, **R. Yuvakkumar\***, Role of different chelating agent in synthesis of copper doped tin oxide (Cu-SnO<sub>2</sub>) nanoparticles. 2nd International conference on Condensed Matter & Applied Physics (ICC-2017), Govt. Engineering College, Bikaner-Rajasthan. (24,25th November 2017).
24. B. Saravanakumar, M. Durga, G. Ravi, **R. Yuvakkumar\***, Role of NaOH concentration on synthesis and characterization of  $\beta$ -V<sub>2</sub>O<sub>5</sub> nanorods by Solvothermal method. International Conference on International Conference on Renewable Energy Research & Education -RERE-18. (8 - 10 Feb 2018).
25. B.Saravanakumar, C.Selvam, G.Ravi, M.Thambidurai, **R. Yuvakkumar\***, Synthesis and characterization of Ni-MgO for pseudocapacitive Applications. International Conference on RENEWABLE ENERGY SCIENCE & TECHNOLOGY (ICREST-2017), Dept. of Energy Science, Alagappa University-Karaikudi. (10,11th March-2017)
26. B. Jansi Rani, B. Saravanakumar, M. Durga, G. Ravi, **R. Yuvakkumar\***, Influence of surfactant on the structural, morphological and optical properties of anatase TiO<sub>2</sub> nanoparticles. International Conference on RENEWABLE ENERGY SCIENCE & TECHNOLOGY (ICREST-2017), Dept. of Energy Science, Alagappa University-Karaikudi. (10,11th March-2017)
27. B. Jansi Rani, Shilpa P. Raj, G. Ravi, **R. Yuvakkumar\***, Surfactant Free SnO<sub>2</sub> Nanoplate Array Synthesis for Supercapacitor Capacitor Applications, International Conference on "RENEWABLE ENERGY RESEARCH & EDUCATION (RERE-2018)" on 9th - 10th Feb 2018 in association with Conn Center for Renewable Energy Research, University of Louisville, **KY-USA**
28. B. Jansi Rani, B. Saravanakumar, G. Ravi, **R. Yuvakkumar\***, Facile Synthesis of SnO<sub>2</sub>/ $\alpha$ -Fe<sub>2</sub>O<sub>3</sub> Nanocomposite for Supercapacitor Capacitor Applications. 2nd International conference on Condensed Matter & Applied Physics (ICC-2017), Govt. Engineering College, Bikaner-Rajasthan (24,25th November 2017)
29. B. Jansi Rani, B. Saravanakumar, G. Ravi, **R. Yuvakkumar\***, Influence of Sintering Temperature on The Structural and Optical Properties of CuO Nano Particles.

- International Seminar on Nnanoscience & Technology (ISNST-2016), Mother Teresa Women's University-Kodaikanal. (September 20, 2016)
30. B. Jansi Rani, B. Saravanakumar, G. Ravi, **R. Yuvakkumar\***, Photoelectrochemical Performance of Pristine and Sn doped  $\alpha$ -Fe<sub>2</sub>O<sub>3</sub> Nanospheres. International Symposium on Nanomaterials for Clean Energy and Health Applications (ISNCHA-2017), Coimbatore Institute of Technology (CIT)-Coimbatore. (6-8 December 2017)
  31. B. Jansi Rani, B. Saravanakumar, G. Ravi, **R. Yuvakkumar\***, "Influence of Reducing Agent (NaBH<sub>4</sub>) Concentration on Structural, Optical & Magnetic Properties of NiO Nanoparticles" National Conference on Futuristic Materials (NCFM-2017), Department of Physics, Alagappa University, Karaikudi. (March 27 & 28 - 2017)
  32. B. Jansi Rani, B. Saravanakumar, G. Ravi, **R. Yuvakkumar\***, "Physico-Chemical Properties of Hematite Nanostructures" National Conference on Systematic Investigations of Structural, Morphological and Optical Properties of Materials (NCSI'16), Department of Physics, Sacred Heart College (Autonomous), Tirupattur, Vellore District (01/12/2016)
  33. B. Jansi Rani, B. Saravanakumar, G. Ravi, **R. Yuvakkumar\***, "Influence of Calcination Temperature on Structural, Optical & Magnetic Properties of Hematite Nanoparticles" National Seminar on Advanced Materials Research (AMR-2017), Department of Physics, Alagappa University, Karaikudi. (January 19 - 2017)
  34. 10th International Conference on Materials for Advanced Technologies on 23-28 June, 2019 in Marina Bay Sands, **Singapore**.
  35. International Conference on Advanced Materials for Clean Energy and Health Applications (AMCEHA 2019) on 6-8 February, 2019 in Department of Physics at University of Jaffna, **Sri Lanka**
  36. B Jansi Rani, **R Yuvakkumar**, 64th DAE Solid State Physics Symposium, organized by: Bhabha Atomic Research Centre, Mumbai, held at Indian Institute of Technology (IIT), Jodhpur at December 18-22, 2019, Rajasthan, India
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