

## Index to *The Chemist*, Volumes 85-89 (2012-2016)

Editor-in-Chief: Dr. David Devraj Kumar, Florida Atlantic University

### *The Chemist*, Volume 85, Number 1&2, 2012

Editorial.....i

#### ARTICLES

- A comparison of total, free, and % free prostate specific antigen for the serodiagnosis of prostate cancer in Hispanic-American and Caucasian-American males  
*T. Maywalt, N. Judenari, G. S. Hendricks, J. T. Johnson, and M. Hall* ..... 1
- Studies on improving performance of PVC compositions for electrical cable sheathing  
*B. R. Manjunath, P. Sadasivamurthy, P. V. Reddy, and K. R. Haridas* ..... 11
- Shear defects to the molecular structure of PVC and other polymers close to nanometric sizes  
*D. W. Riley* ..... 14
- What happens to chemistry with the reforms advocated with STEM  
*R. Yager* ..... 22

#### PUBLIC UNDERSTANDING OF CHEMISTRY

- A chemical news blunder, powered up with cotton  
*L. K. Wolf* ©2010 ACS ..... 24

- Book Reviews ..... 25
- The AIC Code of Ethics ..... 30
- Manuscript Style Guide ..... 32

#### ANNOUNCEMENTS

- Invitation to Authors ..... 37
- National Certification Commission in Chemistry and  
Chemical Engineering (NCCCCCE) ..... 37
- Call for Nominations for 2013 The AIC Awards ..... 38

- AIC Officers & Board of Directors ..... 39

### *The Chemist*, Volume 86, Number 1, 2013

Editorial: Looking Forward .....i

#### ARTICLES

- A comparison of total, free, and % free PSA for the serodiagnosis of prostate cancer in African-American and Caucasian-American males  
*N. Judenari, T. Maywalt, G. S. Hendricks, J. T. Johnson, and M. Hall* ..... 1
- Studies on cenospheres as fillers for PVC compounds for applications in electrical cables  
*B. R. Manjunath, P. Sadasivamurthy, P. V. Reddy, and K. R. Haridas* ..... 10
- Computational studies on the IR and NMR spectra of 2-aminophenol

<i>A. George, P. V. Thomas, and D. D. Kumar</i> .....	15
The chemistry associated with an exploding lead-acid battery	
<i>D. M. Manuta</i> .....	20
Challenges for chemical education: Engaging Green Chemistry and environmental sustainability	
<i>J. Hill, D. D. Kumar, and R. Verma</i> .....	24
Chemistry education; Reflection of a middle school teacher	
<i>J. Strate</i> .....	32
<b>PUBLIC UNDERSTANDING OF CHEMISTRY</b>	
Science & technology communication: Nanotechnology-A positive issue	
<i>S. Baroni, and B. Holmes</i> .....	35
Book Reviews .....	37
The AIC Code of Ethics.....	41
Manuscript Style Guide.....	43
<b>ANNOUNCEMENTS</b>	
Invitation to Authors.....	48
Margot Hall, FAIC received the Dudley Peeler Award .....	48
John Hill Reached his 200th Publication.....	49
AIC Officers & Board of Directors .....	50
 <b><i>The Chemist, Volume 86, Number 2, 2013</i></b>	
Editorial: Chemistry on the March .....	i
<b>ARTICLES</b>	
A Comparison of CA242 with twelve other tumor antigens for the serodiagnosis of pancreatic, gastric, and Other gastrointestinal cancers	
<i>Margot Hall<sup>1*</sup>, Sabrina Bryant<sup>1</sup>, Margaret Jackson<sup>1</sup>, James T. Johnson<sup>2</sup>, Harold Schultze<sup>1</sup>, Wileen Cooksey<sup>1</sup>, Slobodanka D. Manceva<sup>3</sup>, Rasheeda Crowell<sup>1</sup>, Sharae Johnson<sup>1</sup>, Tammy Sims-Davis<sup>1</sup>, Kevin L. Beason<sup>1</sup>, Shawn R. Clinton<sup>1</sup>, Deborah Fortenberry<sup>1</sup>, Cynthia Bright<sup>1</sup>, Helen Hua<sup>1</sup>, Jiarong Ying<sup>1</sup>, and Paul Sykes<sup>3</sup></i> .....	1
Starburst quaternary ammonium salt - A new effective phase transfer catalyst	
<i>Divia N, Siji Mathew, T.D.R. Nair and Karickal R. Haridas</i> .....	17
The combustion of denatured alcohol and its role in a legal case	
<i>David M. Manuta</i> .....	23
Challenges for chemical education: Implementing the 'chemistry for all' vision	
<i>John Hill and David Deoraj Kumar</i> .....	27
<b>PUBLIC UNDERSTANDING OF CHEMISTRY</b>	
Nothing has changed in environmental forensics	
<i>James S. Smith</i> .....	33
E-Cigarettes: Boon or bane?	
<i>Sue Rao</i> .....	35
Making chemistry fun at the Museum of Discovery and Science	
<i>Kim Cavendish and Madelyn Reus</i> .....	38
Book Reviews .....	41
The AIC Code of Ethics.....	44
Manuscript Style Guide.....	46

## ANNOUNCEMENTS

Invitation to Authors.....	51
AIC Officers & Board of Directors .....	52

## **The Chemist, Volume 87, Number 1, 2014**

Editorial: Is Chemistry Still the Central Science? .....	i
--	---

### ARTICLES

A Dye Sensitized Solar Cell Using Red Sandal Dye And 1,3,5-Triphenylamine Derivatives <i>Siji Mathew and Karickal R. Haridas</i> .....	1
The Use of EDS Analysis in a Materials Testing Laboratory <i>Frank Grate</i> .....	8
Improved Corrosion Protection Through Electrodeposition <i>George E. F. Brewer</i> .....	11
Designing Core Concepts for a Tertiary Basic Chemistry Course <i>John O. Hill, David Devraj Kumar and Ranjit K. Verma</i> .....	14

### PUBLIC UNDERSTANDING OF CHEMISTRY

Very Little About Chemistry! <i>Susan Day</i> .....	23
--	----

### BOOK REVIEWS

Nanophysics and Nanotechnology.....	26
rain: The Complete Mind.....	27
Casarett & Doull's Essentials of Toxicology, Edition 2.....	28

### LONGTIME FELLOWS OF THE AIC

Dr. David W. Riley .....	29
Dr. E. G. Meyer.....	30
The AIC Code of Ethics.....	32
Manuscript Style Guide.....	34

## ANNOUNCEMENTS

Invitation to Authors.....	39
AIC Officers & Board of Directors .....	40

## **The Chemist, Volume 87, Number 2, 2014**

Editorial: Chemistry in Life .....	i
Guest Editorial: Clinical Chemistry .....	ii

### ARTICLES

Quantitation of Immunoglobulin E Using Fluorescence Assay <i>W. Adam Shirley, Cynthia Handley, Sabrina Bryant and Margot Hall</i> .....	1
The Hormones of Glucose Metabolism <i>Tammy Shaw, Cynthia Handley and Margot Hall</i> .....	8
Oncogenes and Tumor Suppressor Genes: An Essential Building Block of Cancer	

<i>Hannah Rice, Sabrina Bryant, Cynthia Handley and Margot Hall</i> .....	15
Pick Your Poison	
<i>Erika Leah Harmon Pratte, Sabrina Bryant, Cynthia Handley and Margot Hall</i> .....	19
<b>PUBLIC UNDERSTANDING OF CHEMISTRY</b>	
The Make Up of Your Makeup	
<i>Bethany Davis</i> .....	30
<b>BOOK REVIEWS</b>	
Organic Structure Analysis (second edition) .....	34
Metal Polymer Nanocomposites.....	35
<b>A FRIEND OF CHEMISTRY</b>	
Dr. P. V. Thomas .....	37
The AIC Code of Ethics.....	38
Manuscript Style Guide .....	40
<b>ANNOUNCEMENTS</b>	
Invitation to Authors.....	45
AIC Officers & Board of Directors .....	46
 <b><i>The Chemist, Volume 88, Number 1, 2015</i></b>	
Editorial: STEM Research, Education and Workforce	
<i>David Devraj Kumar</i> .....	i
<b>ARTICLES</b>	
Preparation of Zinc and Calcium Silicate Modified Fly Ash/Styrene Butadiene Rubber Composites	
<i>M. T Ramesan, V. C. Jasna, Joseph Francis, Abdu Raheem V. P. and Subburaj M.</i> .....	1
Ozone in the Stratosphere: An Environmental Accumulation and Flow	
<i>Ronald C. Persin</i> .....	7
Undergraduate Research Engagement Among STEM Majors	
<i>Susan Carol Losh, and Brandon J. O. Nzekwe</i> .....	13
Discovering Infinite Number of Independent Balanced Forms of Some Typical Chemical Equations	
<i>Pramode Ranjan Bhattacharjee</i> .....	26
<b>PUBLIC UNDERSTANDING OF CHEMISTRY</b>	
The STEM Workforce: An Occupational Overview	
<i>Reprinted with permission from the Department of Professional Employees, AFL-CIO</i> .....	34
<b>BOOK REVIEWS</b>	
Clinical Toxicology: Principles and Mechanisms (second edition) .....	44
The AIC Code of Ethics.....	46
Manuscript Style Guide .....	48
<b>ANNOUNCEMENTS</b>	
Invitation to Authors.....	53
AIC Officers & Board of Directors .....	54

## The Chemist, Volume 88, Number 2, 2015

Editorial: Responsible Engagement in Chemistry

David Devraj Kumar ..... i

### ARTICLES

Sonochemical Synthesis and Morphological Study of Nanocrystalline Rutile TiO<sub>2</sub>

Manayil Valappil Swapna and Karickal R. Haridas ..... 1

Exploring a Role for Titanium in Bioinorganic Chemistry

Ann M. Valentine ..... 7

Computational and Experimental Studies of Ni(II) and Co(II) Complexes of 1,3,4 – Oxadiazole Derivatives

Asraf V. Mohamed A. M. A. Khader P. S. Arun, Yohannan Panicker and T. K. Manojkumar ..... 11

A Comparison of Prostatic Acid Phosphatase with Testosterone and Prostate Specific Antigen for the Serodiagnosis of Prostate Cancer in Adult Males

Hannah Rice, Annie Chu, James T. Johnson, Margot Hall ..... 19

### PUBLIC UNDERSTANDING OF CHEMISTRY

Communicating Science

W. Jeffrey Hurst ..... 26

A Look Inside The AIC Awards Program: The Gold Medal and Chemical Pioneer Awards

Sarah Reisert ..... 28

How to Remove Bias from Peer Review

Teri W. Odom ..... 34

Soap Bubbles: Not Just Kids' Stuff!

David Devraj Kumar ..... 36

The AIC Code of Ethics ..... 38

Manuscript Style Guide ..... 40

### ANNOUNCEMENTS

Invitation to Authors ..... 45

## The Chemist, Volume 89, Number 1, 2016

Editorial: Research in Chemistry

David Devraj Kumar ..... iii

### ARTICLES

Structural and Optical Properties of Zinc Oxide Nanorods Prepared by Aqueous Solution Route

David Devraj Kumar, Prabitha B. Nair, Justin Victor V. B., P. V. Thomas ..... 1

Vibrational Spectroscopic and Molecular Docking Studies of 2,6-Dichlorobenzyl Alcohol

Merrin Mary Abraham, Resmi K. S., Sheena Mary, C. Yohannan Panicker, B. Harikumar ..... 6

Electro Analytical Studies on the Interaction and Corrosion Inhibition of a Triazine Dimer (AMTDT) on Metallic Copper in Hydrochloric Acid

Shainy K. M. and Abraham Joseph ..... 16

Thermal and Electrical Properties of Polyindole/Magnetite Nanocomposites

Jayakrishnan P., P. P. Pradyumnan and M. T. Ramesan ..... 27

## **PUBLIC UNDERSTANDING OF CHEMISTRY**

Chemical Risk and the Public Perception <i>Arnold J. Frankel</i> .....	33
The AIC Code of Ethics.....	36
Manuscript Style Guide.....	38

## **ANNOUNCEMENTS**

Invitation to Authors.....	43
----------------------------	----

## ***The Chemist, Volume 89, Number 2, 2016***

Editorial: Time to Reflect <i>David Devraj Kumar</i> .....	iii
---	-----

## **ARTICLES**

Summary of 2016 AIC Gold Medal Speech <i>C. A. Mirkin</i> .....	1
Investigation of the Efficiency of Dye-Sensitized Solar Cell Using Natural Dyes as Photosensitizer <i>S. Mathew, Sajina N., K. R. Haridas</i> .....	2
Synthesis of Diaryl and Arylalkyl Sulfides via Zinc-Catalyzed Thioetherification Reactions <i>A. P. Thankachan, K. S. Sindhu, K. K. Krishnan, G. Anilkumar</i> .....	9
A Comparison of CYFRA 21-1, NSE, and CEA for the Serodiagnosis of Lung Cancer <i>A. Knopp, J. T. Johnson, M. Hall</i> .....	21

## **PUBLIC UNDERSTANDING OF CHEMISTRY**

Revisiting Newlands' Law of Octaves: Tuning in on Transition Metals <i>T. A. Houston</i> .....	28
Veteran Chemist – Dr. Lawrence Duffy <i>Mary van Muelken</i> .....	30
Index to The Chemist, Volumes 82-89 (2012-2016) <i>David Devraj Kumar</i> .....	32
The AIC Code of Ethics.....	38
Manuscript Style Guide.....	40

## **ANNOUNCEMENTS**

Invitation to Authors.....	45
----------------------------	----