

FLUORIDE

Quarterly Journal of The International Society for Fluoride Research Inc.

www.fluorideresearch.org

Owned & published by THE INTERNATIONAL SOCIETY FOR FLUORIDE RESEARCH INCORPORATED © 2018. All rights reserved.

Editor-in-Chief:

Dr Bruce J Spittle. Dunedin, New Zealand. E-mail: spittle727@gmail.com and spittle@es.co.nz

Regional Editor for Africa:

Professor Eli Dahi. Denmark (previously Ngongongare, Tanzania). E-mail: elidahi@hotmail.com

Regional Editor for Eastern Europe:

Professor Dariusz Chlubek. Department of Biochemistry and Chemistry, Pomeranian Medical University, Szczecin, Poland. E-mail: dclubek@sci.pum.edu.pl

Regional Editors for India, Bangladesh, Bhutan, Maldives, Myanmar, Nepal, and Sri Lanka:

For papers on all aspects of fluoride: Dr Shanti Lal Choubisa. Emeritus Professor of Biotechnology, Department of Advanced Science & Technology, Nims University Rajasthan, Jaipur-303121, India. E-mail: choubisasl@yahoo.com
For public health based papers: Professor Vikas K Desai. Community Medicine Department, Government Medical College (GMCS), Majura Gate, Surat, Gujarat, India – 395005. E-mail: psmvikas@hotmail.com

Regional Editor for Latin America, including Mexico, Central America, and Cuba:

Dr Alfredo Rigalli. Rosario, Argentina. E-mail: arigalli@unr.edu.ar and arigalli@conicet.gov.ar

Regional Editor for the Middle East:

Dr Amir Hossein Mahvi. Department of Environmental Health Engineering, School of Public Health and Institute for Environmental Research, Tehran University of Medical Sciences, Tehran, Iran. E-mail: ahmahvi@yahoo.com

Regional Editor for Pakistan and Afghanistan:

Dr Muhammad Nauman Ahmad. Department of Agricultural Chemistry, The University of Agriculture, Peshawar, Pakistan. E-mail: drnumanahmad@aup.edu.pk

Regional Editors for People's Republic of China:

Professor Yanhui Gao. Director of the Institute for Endemic Fluoride Control, Center for Endemic Disease Control, People's Republic of China CDC. E-mail: goayh411@163.com
Professor Zhi-Zhong Guan. Department of Pathology and Key Lab of Endemic and Ethnic Diseases (Guizhou Medical University), Ministry of Education, Guiyang Medical University, Guiyang, People's Republic of China. E-mail: zhizhongguan@yahoo.com

Associate Editors:

Professor Emeritus Hardy Limeback. University of Toronto, Toronto, ON, Canada.
Christopher Neurath. American Environmental Health Studies Project, Lexington, MA, USA.
Associate Professor Jashwanti D Sharma. Department of Zoology, University of Rajasthan, Jaipur, India.
Professor Dianjun Sun. Chinese Research Center for Endemic Disease Control, Harbin Medical University, Harbin, People's Republic of China.
Professor Emeritus Andezhath K Susheela. Fluorosis Research & Rural Development Foundation, Delhi, India.
Prof. Masashi Tsunoda. Dept. of Preventive Medicine and Public Health, National Defense Medical College, Japan.
Professor Emeritus Ming-Ho Yu. Western Washington University, Bellingham, WA, USA.

Editorial Assistant:

Peter Meiers. Saarbrücken, Germany.

Fluoride is available as a free online open access journal at www.fluorideresearch.org and the articles can be accessed by clicking on the links below the titles in the online table of contents for the smallest file size and press quality PDF versions, respectively.

CONFERENCE REPORT

- 291–296..... REPORT ON THE XXXIVTH CONFERENCE OF THE INTERNATIONAL SOCIETY FOR FLUORIDE RESEARCH, GUIYANG, PEOPLE'S REPUBLIC OF CHINA, OCTOBER 18–20, 2018
Zhi-Zhong Guan. Guiyang, People's Republic of China
[smallest file size PDF](#) [press quality PDF](#)

IN MEMORIA

- 297–300..... ZYGMUNT MACHOY: AN OUTSTANDING BIOCHEMIST AND A PIONEER IN FLUORIDE RESEARCH IN POLAND 1924-2018
Dariusz Chlubek. Szczecin, Poland.
[smallest file size PDF](#) [press quality PDF](#)
- 301–304..... HUMIO TSUNODA, MD, PhD: A PIONEER JAPANESE SCIENTIST WHO STUDIED FLUORIDE AND DEVOTED HIS LIFE TO ENVIRONMENTAL MEDICINE 1930–2018
Mashashi Tsunoda. Tokorozawa, Saitama, Japan.
- 304..... TRIBUTE: THE LOSS OF A STALWART
Vikas Kishor Desai. Surat, Gujarat, India.
[smallest file size PDF](#) [press quality PDF](#)
- 305–306..... ZAN-DAO WEI: A PIONEERING SCIENTIST IN FLUORIDE RESEARCH IN THE PEOPLE'S REPUBLIC OF CHINA 1922-2018
Zhi-Zhong Guan, Hua Zhang. Guiyang, People's Republic of China
- 306..... TRIBUTE: THE LOSS OF A LEADING FLUORIDE RESEARCHER IN CHINA
Kenji Akihiwa. Machida City, Tokyo, Japan.
[smallest file size PDF](#) [press quality PDF](#)

EDITORIAL

- 307–318..... FLUORIDE-INDUCED DEVELOPMENTAL DISORDERS AND IODINE DEFICIENCY DISORDERS AS EXAMPLES OF DEVELOPMENTAL DISORDERS DUE TO DISTURBED THYROID METABOLISM
Bruce Spittle. Dunedin, New Zealand.
[smallest file size PDF](#) [press quality PDF](#)

RESEARCH REPORTS

- 319–327..... ADSORPTION OF FLUORIDE ON CHITOSAN IN AQUEOUS SOLUTIONS: DETERMINATION OF ADSORPTION KINETICS
Hamideh Akbari, Sahand Jorfi, Amir Hossein Mahvi, Masoud Yousefi, Davoud Balarak. Tehran, Zahedan, Ahvaz, and Shiraz, Iran.
[smallest file size PDF](#) [press quality PDF](#)
- 328–339..... ATTENUATION BY 7-NITROINDAZOLE OF FLUORIDE-INDUCED TOXICITY IN SH-SY5Y CELLS EXPOSED TO HIGH FLUORIDE: EFFECTS ON NITRIC OXIDE, NITRIC OXIDE SYNTHETASE ACTIVITY, nNOS, AND APOPTOSIS
Ming-Fen Deng, Dan Zhu, Yu-Ping Liu, Wen-Wen He, Chuan-Zhi Gui, Zhi-Zhong Guan. Guiyang, People's Republic of China.
[smallest file size PDF](#) [press quality PDF](#)
- 340–354..... FLUORIDE EXPOSURE CHANGED THE STRUCTURE AND THE FUNCTION OF SPERM IN THE TESTIS AND EPIDIDYMIS OF MALE RATS
Wenpeng Zhao, Hongwei Wang, Panpan Tan, Jing Liu, Cai Zhang, Bianhua Zhou. Luoyang, Henan, People's Republic of China.
[smallest file size PDF](#) [press quality PDF](#)
- 355–365..... HIGHLY EFFICIENT ADSORPTION OF FLUORIDE FROM AQUEOUS SOLUTIONS BY METAL ORGANIC FRAMEWORKS: MODELING, ISOTHERMS, AND KINETICS
Mohamadreza Massoudinejad, Abbas Shahsavani, Bahram Kamarehie, Ali Jafari, Mansour Ghaderpoori, Mostafa M Amini, Afshin Ghaderpoury. Tehran and Khorramabad, Iran.
[smallest file size PDF](#) [press quality PDF](#)
- 366–377..... THE EFFECT OF A CALCIUM PRE-RINSE ON THE SALIVARY AND PLAQUE FLUORIDE AND CALCIUM CONCENTRATIONS AFTER A 900 PPM NAF RINSE: A PLACEBO-CONTROLLED RANDOMIZED CLINICAL TRIAL
Nahid Ramazani, Navid Saadatfar, Amir Hossein Mahvi, Mohsen Ramazani. Zahedan, Tehran.
[smallest file size PDF](#) [press quality PDF](#)

LETTER TO THE EDITOR

- 378–381..... FLUORIDE TOXICITY AND GASTRIC ACIDITY
Kenichi Narita. Akiha Ward, Niigata Prefecture, Japan.
[smallest file size PDF](#) [press quality PDF](#)

ABSTRACTS

FLUORIDE AND IODINE DEFICIENCY DISORDERS

- 382–383..... FLUOROSIS AND IODINE DEFICIENCY DISORDERS IN INDIA. Susheela AK. India.

FLUORIDE EXPOSURE, THYROID FUNCTION, AND IODINE STATUS

- 383–384..... FLUORIDE EXPOSURE AND THYROID FUNCTION AMONG ADULTS LIVING IN CANADA: Malin AJ, Riddell J, McCague H, Till C. Canada and USA.

FLUORIDE EXPOSURE AND THYROID FUNCTION

- 384–385..... IMPACT OF DRINKING WATER FLUORIDE ON HUMAN THYROID HORMONES: A CASE- CONTROL STUDY. Kheradpisheh Z, Mirzaei M, Mahvi AH, Mokhtari M, Azizi R, Fallahzadeh H, Ehrampoush MH. Iran.

PRENATAL FLUORIDE EXPOSURE AND COGNITIVE OUTCOME IN CHILDREN

- 385..... PRENATAL FLUORIDE EXPOSURE AND COGNITIVE OUTCOMES IN CHILDREN AT 4 AND 6–12 YEARS OF AGE IN MEXICO. Bashash M, Thomas D, Hu H, Martinez-Mier EA, Sanchez BN, Basu N, Peterson KE, Ettinger AS, Wright R, Zhang Z, Liu Y, Schnaas L, Mercado-García A, Téllez-Rojo MM, Hernández-Avila M. Canada, Mexico, and USA.

- 385–386..... OP V - 2 PRENATAL FLUORIDE EXPOSURE AND NEUROBEHAVIOR AMONG CHILDREN 1–3 YEARS OF AGE IN MEXICO. Thomas D, Sanchez B, Peterson K, Basu N, Martinez-Mier EA, Mercado-García A, Hernandez-Avila M, Till C, Bashash M, Hu H, Tellez-Rojo MM. Canada, Mexico, and USA.

PRENATAL FLUORIDE EXPOSURE AND ADHD SYMPTOMS IN CHILDREN

- 386–387..... PRENATAL FLUORIDE EXPOSURE AND ATTENTION DEFICIT HYPERACTIVITY DISORDER (ADHD) SYMPTOMS IN CHILDREN AT 6–12 YEARS OF AGE IN MEXICO CITY. Malin AJ, Riddell J, McCague H, Till C. Canada and USA.

ORGANIZATIONAL BIAS AND FLUORIDE RESEARCH

- 387..... BLOOD IS THICKER THAN WATER: FLAWS IN A NATIONAL TOXICOLOGY PROGRAM STUDY. Spencer KF, Limeback H. Canada and USA.

COMMUNITY WATER FLUORIDATION AND URINARY FLUORIDE LEVELS IN PREGNANCY

- 387–388..... COMMUNITY WATER FLUORIDATION AND URINARY FLUORIDE CONCENTRATIONS IN A NATIONAL SAMPLE OF PREGNANT WOMEN IN CANADA. Till C, Green R, Grundy JG, Hornung R, Neufeld R, Martinez-Mier A, Ayotte P, Muckle G, Lanphear B. Canada and USA.

FLUORIDE AND ANAEMIA

- 388..... FLUOROSIS IS LINKED TO ANAEMIA. Susheela AK, Mondal NK, Gupta R, Sethi M, Pandey RM. India..

[smallest file size PDF](#)

[press quality PDF](#)