

# CURRENT SCIENCE

Volume 121 Number 3

10 August 2021

338 In this issue

## GUEST EDITORIAL

339 Challenges in Indian higher education  
Vinod K. Singh

## NEWS

341 Current Science Reports

345 KSTA's policy paper on 'Revamping Science Education in Karnataka'  
S. Ayyappan

## OPINION

346 Structure of Indian science: a re-appraisal  
M. Vijayan

## COMMENTARY

348 The Pesticide Management Bill 2020  
A. D. Dileep Kumar and D. Narasimha Reddy

## SCIENTIFIC CORRESPONDENCE

350 The oldest Birch tree in the Western Himalaya depicting signature of major climatic events of the recent era in its tree rings  
Rupesh Dhyani, Amalava Bhattacharyya and Ranbeer Singh Rawal

## GENERAL ARTICLE

354 Adapting an inquiry-based approach for undergraduate chemistry laboratory courses: an exploratory study  
Sujatha Varadarajan and Savita Ladage

## REVIEW ARTICLE

360 Multiple risk factors contribute to childhood stunting in Karnataka, India  
Srilakshmi M. Raj, Ruwanthi Ekanayake, Meenakshi Bhat, Jayarama Kadandale and Prabhu L. Pingali

## RESEARCH ARTICLES

365 Forecasting sector-wise electricity consumption for India using various regression models  
Renuka Rekhade and D. K. Sakhare

372 Assessing the energy efficiency practices in cities across the world  
Manas Vijayan, Akshay Patil, Vijay Kapse and Sarika Bahadure

384 Sentinel-2 images for effective mapping of soil salinity in agricultural fields  
Khalid A. Al-Gaadi, ElKamil Tola, Rangaswamy Madugundu and Ronnel B. Fulleros

391 Unambiguous detection of OH and H<sub>2</sub>O on the Moon from Chandrayaan-2 Imaging Infrared Spectrometer reflectance data using 3 μm hydration feature  
Prakash Chauhan, Mamta Chauhan, Prabhakar A. Verma, Supriya Sharma, Satadru Bhattacharya, Aditya Kumar Dagar, Amitabh, Abhishek N. Patil, Ajay Kumar Parashar, Ankush Kumar, Nilesh Desai, Ritu Karidhal and A. S. Kiran Kumar



- 402 **Prediction of wheat yield using spectral reflectance indices under different tillage, residue and nitrogen management practices**  
Sujan Adak, K. K. Bandyopadhyay, R. N. Sahoo, N. Mridha, M. Shrivastava and T. J. Purakayastha
- 414 **Carbonates from the Palaeoproterozoic Sleemanabad Formation, Mahakoshal basin, Central India**  
Aditi Sharma and Partha Pratim Chakraborty
- 421 **Erratum: Native shade trees aid bird conservation in tea plantations in southern India**  
T. R. Shankar Raman, Chayant Gonsalves, P. Jeganathan and Divya Mudappa  
[*Curr. Sci.*, 2021, 121(2), 294–305]



#### RESEARCH COMMUNICATIONS

- 423 **Restoration of old genus name *Penaeus* based on molecular phylogenetic affiliations using complete mitochondrial genome**  
C. P. Balasubramanian, V. K. Katneni, M. S. Shekhar, J. Ashok Kumar and K. K. Vijayan
- 428 **Transformation of arsenic by indigenous soil microbes as affected by phosphorus and arsenic**  
Suvo Kr. Das and Shaon Kumar Das

#### BOOK REVIEW

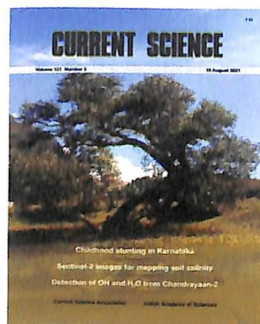
- 435 **Fish Nutrition and its Relevance to Human Health.** A. S. Ninawe, J. R. Dhanze, R. Dhanze and S. T. Indulkar; *reviewed by* A. D. Diwan

#### PERSONAL NEWS

- 437 **M. S. Narasimhan (1932–2021)**  
T. R. Ramadas; S. Ramanan
- 439 **Gade Padmanabham (1964–2021)**  
D. R. Prasada Raju and Tata Narasinga Rao

#### HISTORICAL NOTES

- 441 **Gopinath Kartha and the birth of chemical crystallography in India**  
P. Balaram



- ◀ **COVER.** Over 600 years old magnificent birch tree at Darma Valley, Kumaun region, Western Himalaya. See page 350.

Indexed in CURRENT CONTENTS/GEOTitles/CHEMICAL ABSTRACTS/IndMED/SCOPUS/  
WEB OF SCIENCE