

# Analytical Methods

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## IN THIS ISSUE

ISSN 1759-9679 CODEN AMNECT 16(46) 7845–8048 (2024)



### Cover

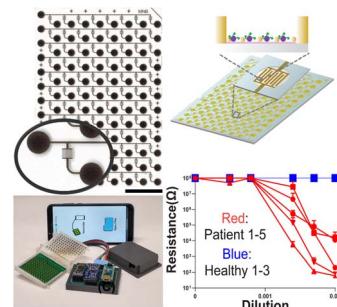
See Aniruddh Sarkar *et al.*, pp. 7854–7863. Image reproduced by permission of Aniruddh Sarkar from *Anal. Methods*, 2024, 16, 7854.

## PAPERS

7854

### High throughput electronic detection of biomarkers using enzymatically amplified metallization on nanostructured surfaces

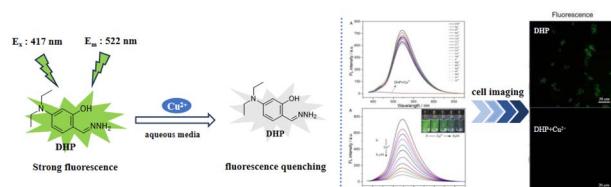
Hanho Zhang, Neda Rafat, Josiah Rudge, Sai Preetham Peddireddy, Yoo Na Kim, Taaseen Khan and Aniruddh Sarkar\*



7864

### A simple turn-off fluorescent chemosensor based on a Schiff base structure for ultrafast and highly selective trace detection of Cu<sup>2+</sup> ions in aqueous solutions

Jing Wang, Lu Ren, Qiang Sun, Yanqi Liu, Wanru Jia, Huihong Zhang and Dawei Zhang\*



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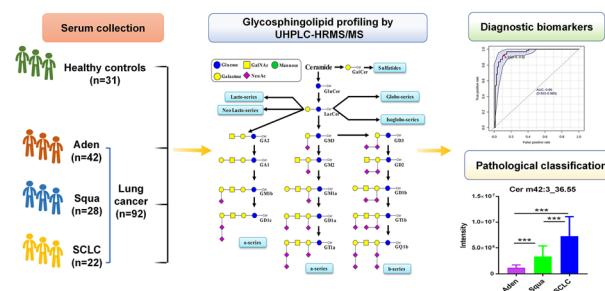


## PAPERS

7873

**Comprehensive profiling of serum glycosphingolipids to discover the diagnostic biomarkers of lung cancer and uncover the variation of glycosphingolipid networks in different lung cancer subtypes**

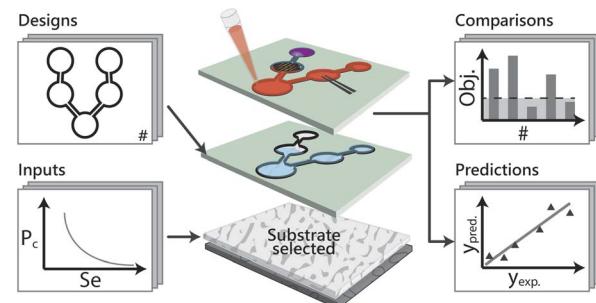
Ting Hu,\* Feifei Han and Zhuoling An\*



7888

**A numerical platform for predicting the performance of paper-based analytical devices**

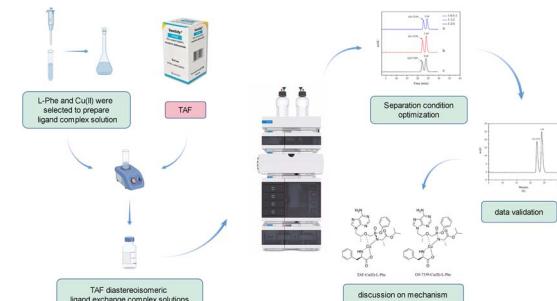
Lawrence K. Q. Yan, Sze Kee Tam and Ka Ming Ng\*



7898

**Splitting and separation mechanism of tenofovir alafenamide fumarate chiral isomers based on indirect chiral ligand exchange chromatography**

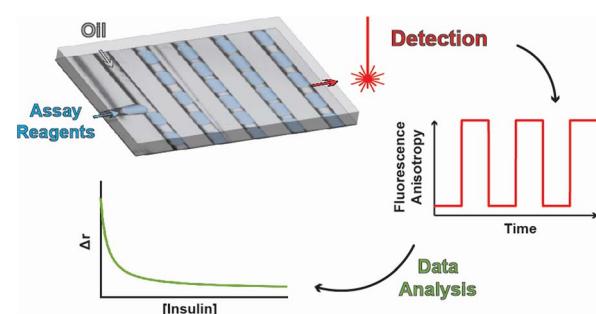
Li Lin, Longchao Xie, Lingyi Huang, Liying Huang\* and Youjia Wu\*



7908

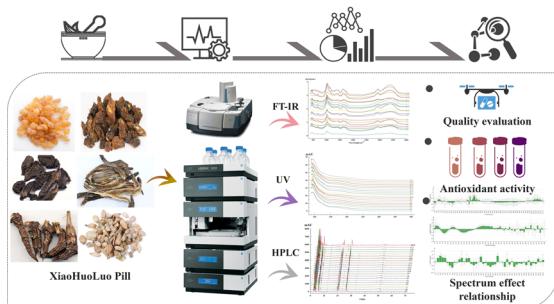
**Droplet-based fluorescence anisotropy insulin immunoassay**

Damilola I. Adeoye, Rafael A. Masitas, James Thornham, Xiangyue Meng, Daniel J. Steyer and Michael G. Roper\*



## PAPERS

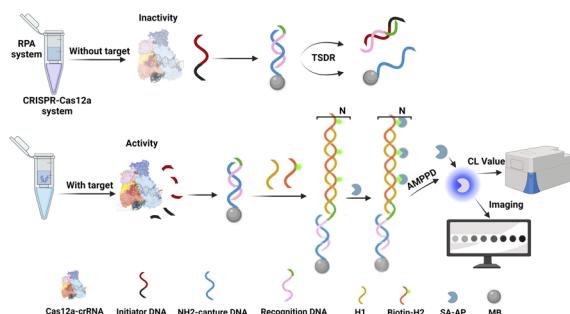
7915



**A rapid evaluation method for the quality consistency assessment and spectrum–effect relationship study of Xiaohuoluo Pills developed based on combined spectral and chromatography technology**

Fangfang Cheng, Yiting Gao, Beibei Ren, Zhongyang Zhang, Minghui Dong, Guoxiang Sun, Chaohui Song, Siqi Wang, Haixia Gao,\* Chunhua Zhou\* and Lingjiao Wang\*

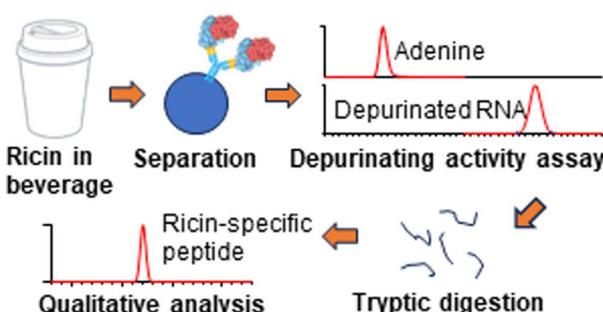
7927



**A chemiluminescent sensor based on CRISPR-HCR technology for the hypersensitive detection of *Mycobacterium tuberculosis***

Yinuo Qiao, Xiaoyan Wang, Xuning Kang, Yuzhu Song, Jinyang Zhang and Qin Qin Han\*

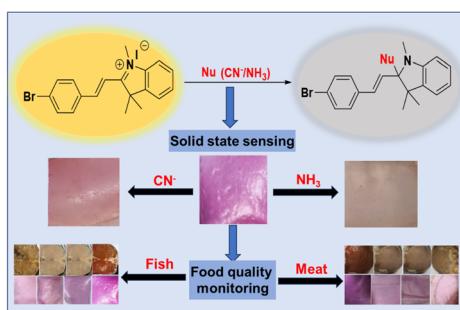
7940



**Simultaneous analysis of depurinated nucleic acid stem-loop and free adenine for ricin toxicity assay by hydrophilic interaction liquid chromatography-high-resolution mass spectrometry (HILIC-HRMS)**

Hajime Miyaguchi

7947



**An indolium ion-based colorimetric sensor for naked-eye detection of cyanide and ammonia: on-site detection technique for cyanide in natural sources and day-to-day monitoring of food spoilage**

Jhorna Borah, Arati Chetry, Arobinda Kakoti and Prithviraj Khakhilary\*

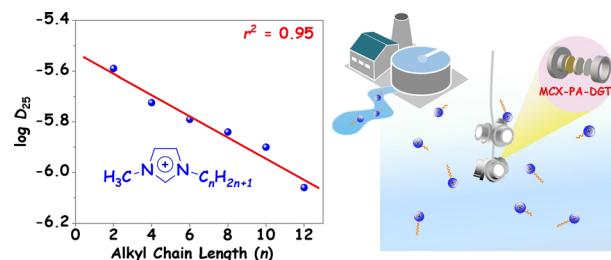


## PAPERS

7955

**Development and validation of diffusive gradients in thin-films for *in situ* monitoring of ionic liquids in waters**

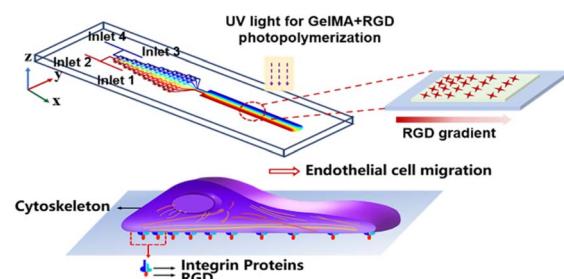
Si-si Liu, Shi-bao Chen, Yu-bo Yue, Xiao-hao Li, Chi Zhang, Guang-Guo Ying and Chang-Er Chen\*



7965

**Micro-fluidic covalent immobilization of multi-gradient RGD peptides on a gelatin surface for studying endothelial cell migration**

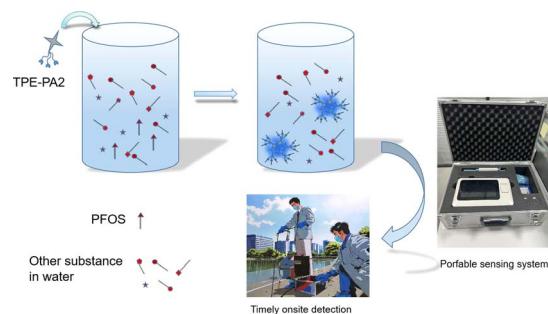
Yunong Yang, Yanxia Wang, Yongjiang Li,\* Xuqu Hu, Changgui Tong, Chundong Xue and Kairong Qin\*



7977

**A portable fluorescence sensing system for timely onsite perfluorooctane sulfonate detection based on an aggregate induced emission fluorescence sensor**

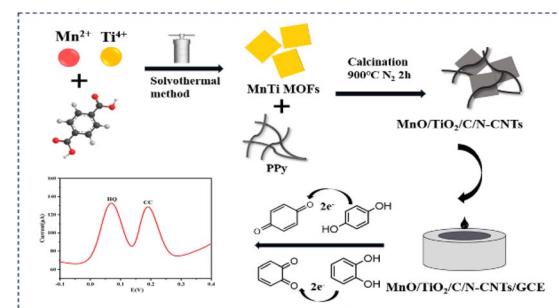
Bin Wang,\* Yaning Yu, Rongxu Zhao, Liang Yan, Tingfeng Tan, Peiyao Chen\* and Chao Ma\*



7985

**MnO/TiO<sub>2</sub>/C/N-CNTs derived from Mn-doped Ti MOFs for simultaneous detection of catechol and hydroquinone**

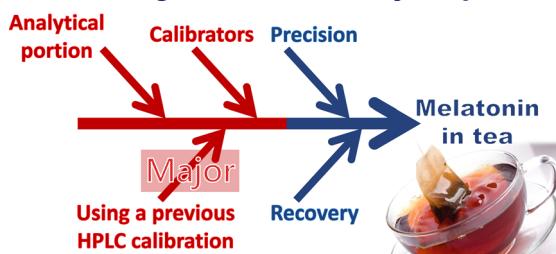
Wenjing Liu, Sumin Xu, Jinjin Zhang and Jianying Qu\*



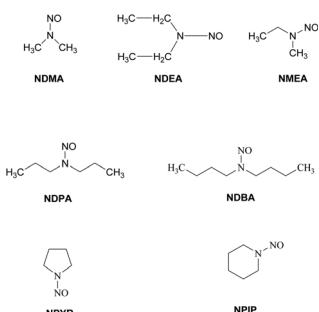
## PAPERS

7994

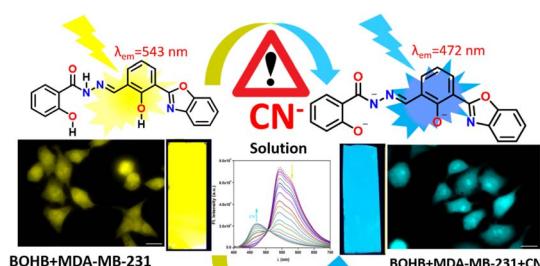
## Combining method validation data with the modelling of other uncertainty components



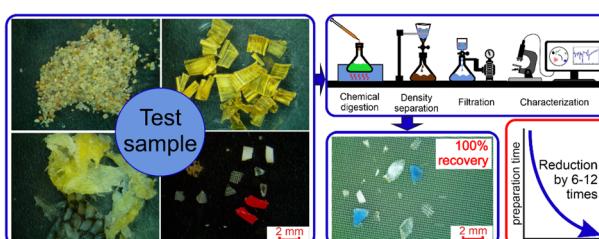
8001



8010



8019



## Combining method validation data with additional information for measurement uncertainty evaluation – determination of melatonin content in tea

Lucía Gutiérrez-Fernández, Cristina M. Oliveira, Ana M. Díez-Pascual, María Paz San Andrés and Ricardo J. N. Bettencourt da Silva\*

Rapid analysis of *N*-nitrosamines in urine using ultra high-pressure liquid chromatography-mass spectrometry

S. Shinde, K. D. Croft, J. M. Hodgson and C. P. Bondorino\*

## A distinctive and proficient fluorescent switch for ratiometric recognition of the menacing cyanide ion: biological studies on MDA-MB-231 cells

Amitav Biswas, Saswati Gharami,\* Atanu Maji, Subhabrata Guha, Gaurav Das, Rahul Naskar and Tapan Kumar Mondal\*

## The development of an analytical procedure for the determination of microplastics in freshwater ecosystems

Yulia S. Sotnikova,\* Elena V. Karpova, Dae Il Song, Dmitriy N. Polovyanenko, Tatiana A. Kuznetsova, Svetlana G. Radionova and Elena G. Bagryanskaya

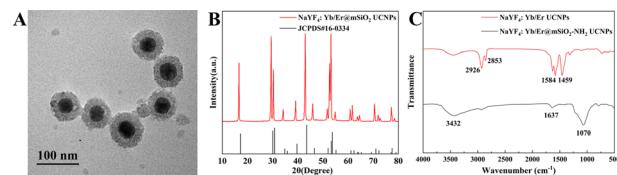


## PAPERS

8027

**Sensitive and specific detection of trace  $\text{Al}^{3+}$  ions using an upconversion nanoparticle–xylenol orange complex *via* the inner filter effect**

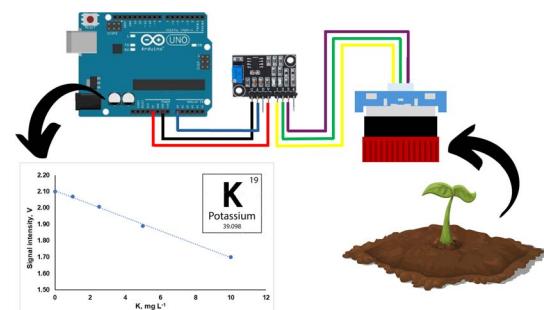
Rui Jiang, Jinfeng Wang, Bin Feng, Panpan Mou, Shuo Zhou, Xianbo Zhang, Yan Zhou, Guosong Chen\* and Donghai Lin\*



8037

**Exploring a low-cost turbidimetric sensor for available potassium determination in soil**

Cristian Kelling Pereira, Ana Barbosa Viana, Adrean Arruda Macedo, Renan Buque Pardinho, Paula Dalla Vecchia and Valderi Luiz Dressler\*



## RETRACTIONS

8045

**Retraction: Combined microporous membrane-based liquid–liquid–liquid microextraction and *in situ* differential pulse voltammetry for highly sensitive detection of trimipramine**

Ali A. Ensafi,\* Sedigheh Rabiei, Behzad Rezaei and Mehdi Jafari-Asl



8046

**Retraction: *p*-Chloranil modified carbon nanotubes paste electrode as a voltammetric sensor for the simultaneous determination of methyldopa and uric acid**

Hassan Karimi-Maleh,\* Mohammad A. Khalilzadeh,\* Zahra Ranjbarha, Hadi Beitollahi, Ali A. Ensafi and Daryoush Zareyee