

## Accepted Manuscript

Title: A novel rhodamine 6G-based fluorescent and colorimetric probe for  $\text{Bi}^{3+}$ : synthesis, selectivity, sensitivity and potential applications

Authors: Ensheng Zhang, Ping Ju, Qiaorong Li, Xiufang Hou, Hua Yang, Xiaojun Yang, Yong Zou, Yuqi Zhang



PII: S0925-4005(17)32441-3  
DOI: <https://doi.org/10.1016/j.snb.2017.12.109>  
Reference: SNB 23797

To appear in: *Sensors and Actuators B*

Received date: 26-7-2017  
Revised date: 13-12-2017  
Accepted date: 18-12-2017

Please cite this article as: Ensheng Zhang, Ping Ju, Qiaorong Li, Xiufang Hou, Hua Yang, Xiaojun Yang, Yong Zou, Yuqi Zhang, A novel rhodamine 6G-based fluorescent and colorimetric probe for  $\text{Bi}^{3+}$ : synthesis, selectivity, sensitivity and potential applications, *Sensors and Actuators B: Chemical* <https://doi.org/10.1016/j.snb.2017.12.109>

This is a PDF file of an unedited manuscript that has been accepted for publication. As a service to our customers we are providing this early version of the manuscript. The manuscript will undergo copyediting, typesetting, and review of the resulting proof before it is published in its final form. Please note that during the production process errors may be discovered which could affect the content, and all legal disclaimers that apply to the journal pertain.

# A novel rhodamine 6G-based fluorescent and colorimetric probe for $\text{Bi}^{3+}$ : synthesis, selectivity, sensitivity and potential applications

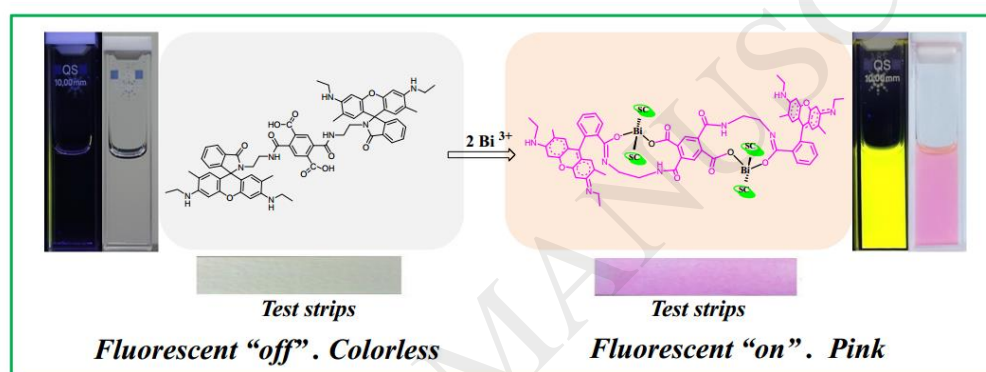
Ensheng Zhang<sup>a</sup>, Ping Ju<sup>a,\*</sup>, Qiaorong Li<sup>a</sup>, Xiufang Hou<sup>a</sup>, Hua Yang<sup>a</sup>, Xiaojun Yang<sup>a</sup>, Yong Zou<sup>b</sup>, Yuqi Zhang<sup>a,\*</sup>

<sup>a</sup> Laboratory of New Energy & New Function Materials and Shaanxi Key Laboratory of Chemical Reaction Engineering, College of Chemistry and Chemical Engineering, Yan'an University, Yan'an, Shaanxi, 716000, P. R. China.

<sup>b</sup> School of Pharmaceutical Sciences, Sun Yat-sen University, Guangzhou, 510006, P. R. China.

E-mail address: xiangjianhuan110@163.com

## Graphic Abstract:



## Key words:

Chemosensor, Rhodamine 6G, Fluorescent, Colorimetric, Bismuth (III) ion

## Highlights:

- A novel fluorescent and colorimetric 'off-on' sensor for the rapid detection of bismuth (III) ions was designed and synthesized.
- Good selectivity and high sensitivity to bismuth (III) ions over other competitive metal ions was observed.
- This sensor could be used as a promising "naked-eye" chemo-sensors for detection of bismuth containing drugs.

## Abstract:

A new fluorescent and colorimetric chemosensor for the rapid detection of bismuth (III)

Download English Version:

<https://daneshyari.com/en/article/7140779>

Download Persian Version:

<https://daneshyari.com/article/7140779>

[Daneshyari.com](https://daneshyari.com)