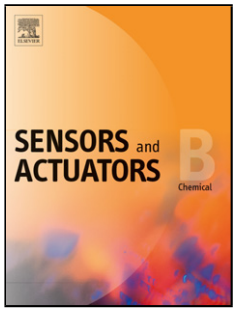

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Reliable electrochemical sensing arsenic(III) in nearly groundwater pH based on efficient adsorption and excellent electrocatalytic ability of AuNPs/CeO_2-ZrO_2 nanocomposite

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Author Contributions

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Highlights

- Sensitive sensing As(III) was achieved using AuNPs/CeO_2-ZrO_2 nanocomposite in nearly groundwater pH.
- The proposed method has excellent anti-interference ability for the determination of As(III).
- Reasonable reason for the enhanced sensitivity of the sensor was studied by XPS tests.
- Designed electrochemical sensor was successfully used for the analysis of real water samples.

ABSTRACT:

Even though electrochemical analytical tools have been widely investigated for toxic As(III) detection and the achievements have also been so fruitful. However,