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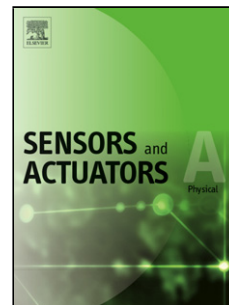
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## Synthesis of TiO<sub>2</sub> nanowires for rapid NO<sub>2</sub> detection

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### Graphical Abstract

A titanium dioxide nanowires (TiO<sub>2</sub>-NWs) has been successfully fabricated by hydrothermal method. It was found that the sensor based on TiO<sub>2</sub>-NWs showed excellent stability, selectivity and high response 3.10 towards 100 ppm NO<sub>2</sub> concentration at room temperature with rapid response and recovery times of 10 s and 19 s, respectively.

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