A Review on Polymer Nanocomposite Materials for Sensing of Atmospheric Green House Gases

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**Abstract**. Over the past few years, there has been a sharp rise in the amount of greenhouse gases in the atmosphere. With little or no interference from the greenhouse gases, a unique conducting polymer composite material was created and used to create a greenhouse gas sensor. The active substance was coated onto the sensor substrate to create a greenhouse gas sensor. Based on the electrochemical changes in the active material brought on by exposure to greenhouse gases, the sensor worked. The analysis of greenhouse gas sensors reveals that up until now, research has focused on finding new active materials and analysing their properties in the context of either pure gases or restricted interferences. The review focuses on the potential consequences of greenhouse gas emissions in the atmosphere, and the next part will focus on CO2, CH4, and NOx sensors based on carbon nanomaterials and composites. Carbon nanotubes and polymer composites have been used to build carbon dioxide, nitrogen oxide, and methane sensors.

**Keywords. Nanomaterials; Chemiresistive sensors; Carbon Nanotube; Greenhouse Gas**