

### 论文摘要

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## 氮气氛下直拉硅中氮含量的红外光谱测定<sup>①</sup>

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**摘要:** 提出了利用直拉硅中与氮有关的特征红外吸收峰963、996、1081<sup>-1</sup>及1027cm<sup>-1</sup>确定直拉硅中氮含量的计算公式并进行了多种样品实测。该法克服了只用963cm<sup>-1</sup>峰测定直拉硅中氮使结果偏低的弊病, 方法相对偏差为5%~20%。

**关键字:** 硅 氮 红外吸收光谱法

## DETERMING NITROGEN IN CZOCHRALSKI-SILICON BY INFRARED ABSORPTION SPECTROMETRY

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**Abstract:** The calculation formula for determination of nitrogen in CZ-Si grown under nitrogen atmosphere by infrared absorption lines related to nitrogen at 963, 996, 1 018 and 1 027cm<sup>-1</sup> was given and the samples were measured with RSD 5%~20%. This method eliminated the deviation caused by using only 963cm<sup>-1</sup> in CZ-Si.

**Key words:** silicon nitrogen infrared absorption spectrometry

