有机质谱学

三聚氰胺的基质辅助激光解吸/电离飞行时间质谱分析

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摘要

关键词

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Analysis of the Melamine by MALDI-TOF MS

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Abstract Oxidized carbon nanotubes are tested as the matrix for analysis of the melamine by ma trix-assisted laser desorption/ionization time-of-flight mass spectrometry (MALDI-TOFMS). Tra ditional MALDI matrix are not suit for analysis of the low molecular compounds due to the interference associated to the matrix clusters. Oxidized carbon nanotubes can transfer energy to the analyte under the laser irradiation, which makes analyte well ionized or desorbed. Moreover, the interference of the intrinsic matrix ions can be eliminated. Melamine as the a toxic additive which had been added in the milk powder, then it is necessary to establish a new method for detection of the melamine rapid and sensitive.

Key words oxidized nanotubes _ matrix assisted _ mass spectrometry _ melamine DOI

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